



Environment

Submitted to:
Lower Passaic River
Cooperating Parties Group

Submitted by:
AECOM
Fort Collins, Colorado
60145884.A116
July 2011

Lower Resolution Coring Characterization Summary

Lower Passaic River Study Area RI/FS



Environment

Submitted to:
Lower Passaic River
Cooperating Parties Group

Submitted by:
AECOM
Fort Collins, Colorado
60145884.A116
July 2011

Lower Resolution Coring Characterization Summary

Lower Passaic River Study Area RI/FS

Prepared By
Jenny Phillips, Project RI Task Manager, AECOM

Reviewed By
Anne Fitzpatrick, R.G. Project Senior Technical Manager, AECOM

Reviewed By
Debra Simmons, Project Quality Assurance Manager, AECOM

Executive Summary

This report documents the Low Resolution Coring (LRC) program conducted in the Lower Passaic River Study Area (LPRSA). It characterizes the data obtained from the sediments collected as part of the Remedial Investigation/Feasibility Study (RI/FS) and begins the process of addressing the goals described in the LRC Data Quality Objectives (DQOs). It does not fully address those goals, as doing so requires the completion of a number of ongoing RI/FS activities, including development and refinement of the sediment transport and chemical fate and transport numerical models, human health and ecological risk assessments, further remedial investigations, and identification and evaluation of remedial alternatives. What it does do is explore and evaluate the patterns observed in the data, focusing on longitudinal and lateral patterns in surficial sediments, vertical patterns in the sediment bed and temporal patterns between this and prior sediment investigations. The patterns are interpreted considering the processes that are expected to influence sediment and chemical fate and transport in the Lower Passaic River (LPR), with the goal of obtaining insights pertinent to the RI/FS process.

The LRC program was developed in accordance with the Guidance for *Conducting Remedial Investigations and Feasibility Studies under Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA)* (United States Environmental Protection Agency [USEPA] 1988a) and the May 2007 Settlement Agreement (USEPA 2007) to determine the nature and extent of sediment contamination, including identification of potential source areas, and to characterize physical characteristics of the sediment in the LPRSA. Two primary DQOs for the LRC program were identified in the *Quality Assurance Project Plan RI Low Resolution Coring/Sediment Sampling* (LRC Quality Assurance Project Plan [QAPP]; ENSR 2008a) and FSP1 (MPI 2006):

DQO 1 - Develop an understanding of the physical characteristics of impacted sediment.

DQO 2 - Characterize the nature and extent of contamination in sediment within the LPRSA.

The term “low resolution” in LRC refers to the thickness of the sediment slices analyzed during the program: 6 inches (at the surface); 1 foot at intermediate depths; and 2 feet at greater depths. The program covered the entire 17.4-mile study area and the tributaries of the LPR. In addition, it targeted sediments from areas outside the boundary of the LPRSA. As stated in the LRC QAPP (ENSR 2008a), the field and laboratory data collected during this program will be used in the RI/FS process to:

- Provide a comprehensive characterization of the nature and extent of sediment contamination within the LPRSA;
- Aid in the characterization of potential sources of contaminants;
- Provide a comprehensive physical characterization of sediment within the LPRSA; and
- Aid in the refinement of the identification and characterization of erosional and depositional zones.

Field and analytical protocols are described in the LRC QAPP. The LRC QAPP Revision 1 was approved for implementation by USEPA on July 18, 2008. Subsequently, three revisions (Revision 2 submitted July 24, 2008; Revision 3 submitted July 29, 2008; and Revision 4 submitted October 20, 2008) have been incorporated into the LRC QAPP.

One-hundred-fifteen sampling locations were proposed for this investigation, including 98 in the LPR; 7 above Dundee Dam; 3 in each of the Second, Third, and Saddle rivers; and 1 in the unnamed creek. An additional three locations in the former Dundee Canal and Weasel Brook were proposed for sampling in December 2008, bringing the total number of target locations to 118. At the completion of the program, sediment cores were successfully collected at 110 locations. Sampling locations were chosen to provide

representative spatial coverage to examine nature and extent of contamination in the LPRSA, identify potential source areas, and gather physical characteristics data to understand sediment stability over the full study area (ENSR 2008a).

The analyses performed on the sediment samples were grouped into four categories (Groups A through D). The constituents reported for each analysis were those identified in the LRC QAPP (ENSR 2008a) and are summarized below:

- **Group A** (All locations): radionuclides, polychlorinated dibenzo-p-dioxin/polychlorinated dibenzofuran (PCDDs/PCDFs), polychlorinated biphenyl (PCB) congeners, polycyclic aromatic hydrocarbons (PAHs), pesticides, mercury, volatile organic compounds (VOCs), semivolatile organic compounds (SVOCs), metals, butyltins, cyanide (CN), total organic compound (TOC), herbicides, total petroleum hydrocarbon (TPH)-extractables, grain size, specific gravity, Atterberg limits, and total sulfide.
- **Group B** (11 locations): TPH-purgeables, hexavalent chromium (Cr(VI)), methyl mercury, acid volatile sulfide/simultaneously extracted metals (AVS/SEM), total phosphorus, ammonia, and total Kjeldahl nitrogen (TKN).
- **Group C** (6 locations): Additional particle size-density classification, microscopy, petrography, and PCB sediment-water partitioning (equilibrium partitioning) analyses performed on surficial sediment samples.
- **Group D** (8 locations): Finer segmentation or resolution of samples from 0 to 2 feet below the sediment surface (2 to 30 centimeters segmentation). Analytes included grain size, bulk density, PCDDs/PCDFs, PCB congeners, PAHs by High Resolution Gas Chromatography/Low Resolution Mass Spectrometry - Selected Ion Monitoring (HRGC/LRMS-SIM), pesticides by High Resolution Gas Chromatography/High Resolution Mass Spectrometry (HRGC/HRMS), mercury, TOC, SVOCs, metals, CN, and herbicides.

Data collection and data validation were performed in accordance with the LRC QAPP and Health and Safety Plan; data collection was carried out as scoped, samples were analyzed according to the proposed methods, and the quality assurance/quality control (QA/QC) performance criteria were achieved. The following specific performance goals were achieved:

- Field completeness, defined as the percentage of samples actually collected versus those intended to be collected per the LRC QAPP (ENSR 2008a, Section 2.1), had a stated goal of greater than 95 percent. The LRC program achieved 96 percent field completeness.
- Laboratory completeness was defined as the percentage of valid data points versus the total expected from the laboratory analyses. Valid data points are those that have not been rejected during the validation process. The objective stated in the LRC QAPP for this project was greater than 90 percent laboratory completeness. Laboratory completeness was 99.75 percent (368,013 valid and acceptable results out of 368,946 total reportable sediment results).
- The safety goal for this project was zero incidents and zero accidents. This goal was achieved; zero incidents and zero accidents occurred during field implementation.

On January 25, 2011, Region 2 directed that all validated¹ dioxin/furan (PCDD/PCDF) data generated by the CPG as part of the EPA-approved LRC QAPP should be adjusted to address what was

¹ Worksheet 35, page 2 of the Region 2 approved LRC QAPP states “at a minimum, 100% full validation (includes review of raw data and spot check for verification of calculations) will be conducted for Dioxins/Furans, and PCB Homologs and Congeners for each sample delivery group (SDG)”.

characterized in reports prepared by Region 2's oversight consultant (Malcolm Pirnie, Inc. September 23, 2009) and an EPA Office of Water consultant (CSC Environmental Solutions March 2010 and January 2011) as a "disparity" or "systematic bias" between the split samples analyzed by the CPG's laboratory (Columbia Analytical Services [CAS]) and Region 2's laboratory (Axys Analytical Services [AXYS]). In its January 2011 report, CSC Environmental Solutions recommended a set of rules to adjust the CPG's PCDD/PCDF results as follows:

1. No adjustment is provided for CAS data for all results below CAS's Quantification Limit.
2. For all samples which were split by MPI, the CAS results are to be replaced with the results generated by Region 2's laboratory, AXYS.
3. For all remaining results, the congener-specific adjustment factors developed by CSC Environmental Solutions are to be applied.

CSC Environmental Solutions reports are provided as **Appendix S**.

It was agreed that a unique validation qualifier "F" was assigned to results replaced or adjusted based on rules 2 and 3.

For purposes of clarity and transparency, the project database was modified to include the original CAS laboratory results, the adjustment factor (where applicable), and either the substituted AXYS results or adjusted concentration. A summary of the original, replaced, and adjusted data is also provided in **Appendix T**.

The CPG prepared, and submitted to Region 2 on June 6, 2011, a comprehensive response documenting concerns related to these specific directions. Region 2, after review of the CPG's response, determined that the concerns cited would be unlikely to substantially change the need for and magnitude of the congener-specific adjustment factors developed by CSC Environmental Solutions; however, Region 2 has tasked CSC Environmental Solutions to prepare a complete response to the issues raised by the CPG in the correspondence noted above.

A subset of analytes was selected to illustrate the physical properties and chemical nature and extent within the LPRSA sediments. These analytes include those that have been the focus of other data reviews, including the contaminants of potential concern (COPCs) defined in the Empirical Mass Balance Model of the Focused Feasibility Study (MPI 2007b). Chapter 3.0 presents a set of tables and figures depicting the LRC data without interpretation. Analysis and interpretation of the data will be presented in the Remedial Investigation (RI) report.

List of Acronyms

°C	degrees Celsius
AECOM	AECOM, Inc.
AVS/SEM	acid volatile sulfide/simultaneously extracted metals
BAZ	Biologically Active Zone
Be-7	Beryllium-7
Cas_n	Chemical Abstract Service Number
CERCLA	Comprehensive Environmental Response, Compensation, and Liability Act
cm	Centimeter
CN	cyanide
COC	chain-of-custody
COPC	contaminant of potential concern
CPG	Cooperating Parties Group
Cr(VI)	hexavalent chromium
Cs-137	Cesium-137
CSO	combined sewer overflow
Cu/Ni	Copper/Nickel
CVAFS	Cold Vapor Automatic Fluorescence Spectrophotometry
CVCC	Clean Venture/Cycle-Chem, Inc.
DDx	sum of DDD, DDE, and DDT isomers
DGPS	Differential Global Positioning System
DI	deionized
DL	Detection Limit
dmi	de maximis, inc.
DOE	Department of Energy
DQI	data quality indicator
DQL	Data Quality Level
DQO	Data Quality Objective
DVR	data validation report
ECD	Electron Capture Detector
EDD	electronic data deliverable
EDL	estimated detection limit
EHS	environmental health and safety
EMPC	estimated maximum possible concentration
EqP	Equilibrium Partitioning

foc	fraction of organic carbon
FM	field modification
FSP	Field Sampling Plan
FTM	Field Task Manager
GBA	Gahagan and Bryant Associates, Inc.
GC	Gas Chromatography
GC/ECD	gas chromatography/electron capture detector
GC/FID	Gas Chromatography/Flame Ionization Detector
GC/MS	Gas Chromatography/Mass Spectroscopy
GFAA	Graphite Furnace Atomic Absorption
GPS	Global Positioning System
H ₂ S	hydrogen sulfide
HASP	Health and Safety Plan
HMW	High Molecular Weight
HRGC/HRMS	High Resolution Gas Chromatography/High Resolution Mass Spectrometry
HRGC/LRMS-SIM	High Resolution Gas Chromatography/Low Resolution Mass Spectrometry - Selected Ion Monitoring
ICP	Inductively Coupled Plasma
ICP/AES	Inductively Coupled Plasma/Atomic Emission Spectrometry
ICP/MS	Inductively Coupled Plasma/Mass Spectrometry
ICS	interference check sample
ID	Inside Diameter
IDW	investigation-derived waste
IQR	interquartile range
J	estimated concentration qualifier
JSA	job safety analyses
kg	kilogram
K-40	Potassium-40
LCS	laboratory control sample
LCSD	laboratory control sample duplicate
LMW	Low Molecular Weight
LPR	Lower Passaic River
LPRRP	Lower Passaic River Restoration Project
LPRSA	Lower Passaic River Study Area
LRC	Low Resolution Coring
MARLAP	Multi-Agency Radiological Laboratory Analytical Protocols
MDL	Method Detection Limit

MEDD	multi-media electronic data deliverable
mg/kg	milligrams per kilogram
MPI	Malcolm Pirnie, Inc.
MS	matrix spike
MSD	matrix spike duplicate
NCR	nonconformance report
ND	nondetect
NIST	National Institute of Standards and Technology
NJDEP	New Jersey Department of Environmental Protection
NJDOT	New Jersey Department of Transportation
OD	outside diameter
OSI	Ocean Surveys, Inc.
PAH	Polycyclic Aromatic Hydrocarbon
Pb-210	Lead-210
PCB	polychlorinated biphenyl
PCDD	polychlorinated dibenzo- <i>p</i> -dioxin
PCDF	polychlorinated dibenzofuran
PE	Performance Evaluation
Phoenix	Phoenix Chemistry Services
Po-210	Polonium-210
PPE	Personal Protective Equipment
ppt	parts per thousand
PRP	Potentially Responsible Party
PRSA	Passaic River Study Area
QA	Quality Assurance
QA/QC	quality assurance/quality control
QAPP	Quality Assurance Project Plan
QC	Quality Control
QL	Quantitation Limit
Q-Q	quantile-quantile
R/V	Research Vessel
Ra-226	Radium-226
RI	Remedial Investigation
RI/FS	Remedial Investigation/Feasibility Study
RL	reporting limit
RM	River Mile

RPD	Relative Percent Difference
RTC	Resource Technology Corporation
SDG	Sample Delivery Group
SEM	Simultaneously Extracted Metals
Settlement Agreement	Administrative Settlement Agreement and Order on Consent
SOP	Standard Operating Procedure
SSO	Site Safety Officer
SVOC	semivolatile organic compound
TCDD	Tetrachlorodibenzodioxin
TCLP	Toxicity Characteristic Leaching Procedure
TEQ	Toxicity Equivalency Quotient
TIC	Tentatively Identified Compound
TKN	total kjeldahl nitrogen
TOC	total organic carbon
TPH	total petroleum hydrocarbons
TSA	Technical System Audit
UJ	Estimated Reporting Limit Qualifier
umol/g-oc	micromole per gram-organic carbon
UPR	Upper Passaic River
USACE	United States Army Corps of Engineers
USCG	United States Coast Guard
USEPA	United States Environmental Protection Agency
VOC	volatile organic compound
VTC	Visitor Traffic Center
Work Plan	Lower Passaic River Restoration Project Work Plan

Contents

1.0	Introduction	1-1
1.1	Environmental History and Setting	1-2
1.1.1	History of the LPR	1-2
1.1.2	Physical Setting of the LPRSA	1-3
1.2	Data Quality Objectives for the LRC Program	1-4
1.3	LRC Program Design	1-4
2.0	Field Implementation	2-1
2.1	CPG Field Facility	2-1
2.2	Field Contractors and Subcontractors	2-1
2.2.1	Ocean Surveys, Inc.	2-2
2.2.2	Gahagan and Bryant Associates, Inc.	2-2
2.2.3	Laboratories	2-2
2.2.4	Data Validation	2-3
2.3	Health and Safety	2-3
2.3.1	Training and Meetings	2-3
2.3.2	Air Monitoring	2-4
2.3.3	Inspections and Audits	2-5
2.3.4	EHS Near Misses and Job Safety Analyses	2-5
2.4	Sampling Program Design	2-5
2.4.1	Station Location Selection Process	2-5
2.4.2	Target Depths and Sample Intervals	2-7
2.5	Analytical Program Design and Hierarchy	2-8
2.5.1	Analytical Suites	2-8
2.5.2	Prioritization	2-10
2.6	General Field Activities	2-11
2.6.1	Site Control	2-11
2.6.2	Staff Training	2-11
2.6.3	Permitting and Notifications	2-11
2.6.4	Utility Clearance	2-12
2.6.5	Sediment Probing	2-13
2.6.6	Tide Gage Station Installation and Vertical Control	2-13
2.6.7	Vessel Positioning/Horizontal Control	2-13
2.6.8	Scheduling	2-14
2.6.9	Sample Nomenclature	2-14
2.6.10	Equipment Decontamination	2-15
2.6.11	Sample Custody, Storage, and Shipment	2-16
2.6.12	Investigation-Derived Waste	2-16
2.7	Sample Collection	2-17
2.7.1	Sediment Coring	2-17

2.7.2	Surface Grab Sample Collection	2-20
2.7.3	Finer Segmentation Core Sample Collection.....	2-21
2.8	Sample Processing	2-22
2.8.1	Sediment Core Processing	2-22
2.8.2	Grab Sample Processing	2-25
2.8.3	Finer Segmentation Sample Processing.....	2-25
2.9	Field Measurements.....	2-27
2.9.1	Sediment Bulk Density Measurements	2-27
2.9.2	Salinity Measurements.....	2-27
2.10	Sample Analysis.....	2-27
2.10.1	Metals	2-28
2.10.2	PAHs by HRGC/LRMS-SIM	2-28
2.10.3	PCB Congeners	2-28
2.10.4	Pesticides by HRGC/HRMS	2-29
2.10.5	Radiochemistry	2-29
2.10.6	TPH-Extractables	2-29
2.11	Quality Assurance/Quality Control.....	2-29
2.11.1	Quality Control Samples	2-29
2.11.2	Internal Assessments and Corrective Action	2-30
2.11.3	Data Validation	2-31
2.11.4	Third-party Evaluations	2-33
2.12	Data Management.....	2-34
2.12.1	Data Summaries	2-34
2.12.2	Database	2-35
2.12.3	Reporting Conventions	2-35
3.0	LRC Results.....	3-1
3.1	Group A	3-1
3.1.1	Concentration Box and Whisker Diagrams	3-1
3.1.2	Surficial Sediment Concentrations by River Mile	3-1
3.1.3	Surficial Sediment Concentrations Maps	3-2
3.1.4	Analyte Concentrations by Depth.....	3-2
3.1.5	Analyte Concentrations vs. Total Organic Carbon	3-2
3.1.6	Vertical Downcore Profiles.....	3-2
3.1.7	Analytical Summary Tables	3-3
3.1.8	Radiochemistry Analysis.....	3-3
3.1.9	Evaluation of Extreme Values	3-3
3.2	Group B	3-5
3.2.1	Mercury and Methyl Mercury	3-6
3.2.2	AVS/SEM	3-6
3.2.3	TPH Purgeables	3-6
3.2.4	Cr(VI)	3-6
3.2.5	Nutrients	3-6
3.3	Group C	3-6

3.4	Group D	3-7
4.0	Data Usability	4-1
4.1	Data Quality Indicators.....	4-2
4.1.1	Precision.....	4-2
4.1.2	Accuracy.....	4-3
4.1.3	Representativeness	4-4
4.1.4	Comparability	4-4
4.1.5	Completeness	4-5
4.1.6	Sensitivity	4-6
4.2	Analyte-specific Assessment of Usability	4-6
4.2.1	AVS/SEM	4-6
4.2.2	Butyltins	4-7
4.2.3	PCDDs/PCDFs.....	4-7
4.2.4	General Chemistry	4-7
4.2.5	Geotechnical	4-8
4.2.6	Herbicides	4-8
4.2.7	Cr(VI)	4-8
4.2.8	Mercury and Methyl Mercury	4-8
4.2.9	Metals	4-8
4.2.10	PAHs by HRGC/LRMS-SIM	4-9
4.2.11	PCB Aroclors.....	4-9
4.2.12	PCB Congeners	4-9
4.2.13	Pesticides by GC/ECD.....	4-10
4.2.14	Pesticides by HRGC/HRMS	4-10
4.2.15	Radiochemistry	4-10
4.2.16	SVOCs.....	4-11
4.2.17	TPH-extractables	4-11
4.2.18	TPH-purgeables	4-11
4.2.19	VOCs	4-11
4.3	Rejected data	4-12
5.0	References.....	5-1

List of Appendices

Appendix A Data Quality Objectives

Appendix B Field Modification/Nonconformance Forms

Appendix C Ambient Air Monitoring from Process Tent and within Warehouse

Appendix D Sample Summary Table

Appendix E Probing Data

Appendix F Tide Gage Data and Water Level Record

Appendix G Sediment Core Collection Record

Appendix H Hazardous and Non-hazardous Shipping Manifests and Analytical Data from Investigation Derived Waste

Appendix I Daily Activity Logs

Appendix J Sediment Grab Collection Records

Appendix K Lithology Core Records

Appendix L Core and Grab Photos – included on CD

Appendix M Performance Evaluation Sample Results

Appendix N Data Validation Reports

Appendix O Data Results Summary

Appendix P QC Results Summary

Appendix Q Laboratory Electronic Data Deliverables and Data Reports

Appendix R Extreme Value Evaluation

Appendix S CSC Environmental Solutions Reports

Appendix T Summary of Adjusted PCDD/PCDF data

List of Tables

Table 1-1	Proposed Sampling Locations	1-6
Table 2-1	Analytical Methods and Laboratories.....	2-37
Table 2-2	Sediment Core Collection Summary.....	2-41
Table 2-3	Summary of Core Processing	2-47
Table 2-4	Selected Analytes by Location which were Not Submitted for Analysis Due to Limited Sample Volume	2-50
Table 2-5	Bridges Within the LPRSA	2-51
Table 2-6	Non-Hazardous Waste Shipment Summary (55-gallon Steel Drums)	2-52
Table 2-7	Locations Abandoned for Sediment Core Sampling	2-53
Table 2-8	Surface Grab Sample Collection Summary.....	2-54
Table 2-9	Bulk Density for LRC Sediment Samples	2-61
Table 2-10	PE for Analytical Methods Using Certified Reference Material	2-66
Table 2-11	Laboratory Audit Summary	2-67
Table 2-12	Data Qualification Codes and Definitions	2-68
Table 2-13	Summary of MPI Split Sampling	2-69
Table 2-14	Location of Field and Laboratory Data.....	2-71
Table 3-1	Selected LRC Analytes and Physical Parameters for Presentation of Results	3-8
Table 3-2a	Highest Surficial (0-0.5 ft) Sediment Concentrations for Selected Chemical Analytes ¹ ..	3-9
Table 3-3	Ten Highest Surficial (0-0.5 ft) Concentrations for Selected Analytes ¹	3-10
Table 3-4	Ten Highest Concentrations for Selected Analytes ¹ (All Depths).....	3-11
Table 3-5	Depth of Highest Concentration for Selected Chemical Analytes for Each LRC Location	3-13
Table 3-6	Constituents Considered in Analysis of Extreme Values	3-15
Table 3-7	Evaluation Steps for Extreme Values	3-17
Table 3-8	Extreme Values by Location and Sample.....	3-22
Table 3-9	Mercury and Methyl Mercury Data in Surficial Segments ¹	3-24
Table 3-10	Sediment Grab Sample SEM and AVS Analytical Results	3-25
Table 3-11	Comparison of Group A and Group D Concentrations ¹	3-26
Table 3-12	Comparison of Group A and Group D Concentrations, Normalized to TOC ¹	3-28
Table 4-1	Data Qualification and Rejection Based on Accuracy Indicators.....	4-14

List of Figures

Figure 1-1	Lower Passaic River Study Area	1-18
Figure 1-2	Proposed and Actual Sediment Sample Locations	1-19
Figure 1-3	Proposed and Actual Sediment Sample Locations	1-25
Figure 2-1	Water Level Monitoring Stations in the Lower Passaic River	2-73
Figure 2-2	Sampled Core Intervals By River Mile and Depth	2-734
Figure 3-1.a	2008 LRC Box and Whisker Plots: 2,3,7,8-TCDD	3-30
Figure 3-1.b	2008 LRC Box and Whisker Plots: Total TEQ	3-31
Figure 3-1.c	2008 LRC Box and Whisker Plots: Total PCBs	3-32
Figure 3-1.d	2008 LRC Box and Whisker Plots: HMW PAHs	3-33
Figure 3-1.e	2008 LRC Box and Whisker Plots: LMW PAHs	3-34
Figure 3-1.f	2008 LRC Box and Whisker Plots: Total DDx	3-35
Figure 3-1.g	2008 LRC Box and Whisker Plots: Dieldrin	3-36
Figure 3-1.h	2008 LRC Box and Whisker Plots: Total Chlordane	3-37
Figure 3-1.i	2008 LRC Box and Whisker Plots: Mercury	3-38
Figure 3-1.j	2008 LRC Box and Whisker Plots: Cadmium	3-39
Figure 3-1.k	2008 LRC Box and Whisker Plots: Copper	3-40
Figure 3-1.l	2008 LRC Box and Whisker Plots: Lead	3-41
Figure 3-1.m	2008 LRC Box and Whisker Plots: TOC	3-42
Figure 3-1.n	2008 LRC Box and Whisker Plots: Percent Fines	3-43
Figure 3-2.a	Surficial Concentration vs. River Mile, Log Scale – 2,3,7,8-TCDD Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-44
Figure 3-2.b	Surficial Concentration vs. River Mile, Linear Scale – 2,3,7,8-TCDD Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-45
Figure 3-2.c	Surficial Concentration vs. River Mile, Log Scale – Total TEQ Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-46
Figure 3-2.d	Surficial Concentration vs. River Mile, Linear Scale – Total TEQ Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-47
Figure 3-2.e	Surficial Concentration vs. River Mile, Log Scale – Total PCBs Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-48
Figure 3-2.f	Surficial Concentration vs. River Mile, Linear Scale – Total PCBs Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-49
Figure 3-2.g	Surficial Concentration vs. River Mile, Log Scale – Total HMW PAHs Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-50
Figure 3-2.h	Surficial Concentration vs. River Mile, Linear Scale – Total HMW PAHs Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-51
Figure 3-2.i	Surficial Concentration vs. River Mile, Log Scale – Total LMW PAHs Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-52

Figure 3-2.j	Surficial Concentration vs. River Mile, Linear Scale – Total LMW PAHs Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only.....	3-53
Figure 3-2.k	Surficial Concentration vs. River Mile, Log Scale – Total DDX Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-54
Figure 3-2.l	Surficial Concentration vs. River Mile, Linear Scale – Total DDX Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only.....	3-55
Figure 3-2.m	Surficial Concentration vs. River Mile, Log Scale – Dieldrin Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-56
Figure 3-2.n	Surficial Concentration vs. River Mile, Linear Scale – Dieldrin Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-57
Figure 3-2.o	Surficial Concentration vs. River Mile, Log Scale – Total Chlordane Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only.....	3-58
Figure 3-2.p	Surficial Concentration vs. River Mile, Linear Scale – Total Chlordane Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only.....	3-59
Figure 3-2.q	Surficial Concentration vs. River Mile, Log Scale – Mercury Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-60
Figure 3-2.r	Surficial Concentration vs. River Mile, Linear Scale – Mercury Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-61
Figure 3-2.s	Surficial Concentration vs. River Mile, Log Scale – Cadmium Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-62
Figure 3-2.t	Surficial Concentration vs. River Mile, Linear Scale –Cadmium Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only.....	3-63
Figure 3-2.u	Surficial Concentration vs. River Mile, Log Scale – Copper Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-64
Figure 3-2.v	Surficial Concentration vs. River Mile, Linear Scale – Copper Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-65
Figure 3-2.w	Surficial Concentration vs. River Mile, Log Scale – Lead Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only.....	3-66
Figure 3-2.x	Surficial Concentration vs. River Mile, Linear Scale – Lead Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-67
Figure 3-3.a	2008 LRC Surficial Analyte Concentration: 2,3,7,8-TCDD	3-9668
Figure 3-3.b	2008 LRC Surficial Analyte Concentration: Total TEQ.....	3-70
Figure 3-3.c	2008 LRC Surficial Analyte Concentration: Total PCBs	3-72
Figure 3-3.d	2008 LRC Surficial Analyte Concentration:Total HMW PAHs.....	3-74
Figure 3-3.e	2008 LRC Surficial Analyte Concentration: Total LMW PAHs	3-76
Figure 3-3.f	2008 LRC Surficial Analyte Concentration: Total DDX	3-78
Figure 3-3.g	2008 LRC Surficial Analyte Concentration: Dieldrin	3-80
Figure 3-3.h	2008 LRC Surficial Analyte Concentration: Total Chlordane.....	3-82
Figure 3-3.i	2008 LRC Surficial Analyte Concentration: Mercury.....	3-84
Figure 3-3.j	2008 LRC Surficial Analyte Concentration: Cadmium	3-86
Figure 3-3.k	2008 LRC Surficial Analyte Concentration: Copper	3-88

Figure 3-3.l	2008 LRC Surficial Analyte Concentration: Lead	3-90
Figure 3-3.m	2008 LRC Surficial Analyte Concentration: TOC	3-92
Figure 3-3.n	2008 LRC Surficial Analyte Concentration: Percent Fines (%)	3-94
Figure 3-4.a	Profiles of Core Data by River Mile and Depth: 2,3,7,8-TCDD.....	3-96
Figure 3-4.b	Profiles of Core Data by River Mile and Depth: Total TEQ.....	3-97
Figure 3-4.c	Profiles of Core Data by River Mile and Depth: Total PCB.....	3-98
Figure 3-4.d	Profiles of Core Data by River Mile and Depth: HMW PAHs.....	3-99
Figure 3-4.e	Profiles of Core Data by River Mile and Depth: LMW PAHs	3-100
Figure 3-4.f	Profiles of Core Data by River Mile and Depth: Total DDx	3-101
Figure 3-4.g	Profiles of Core Data by River Mile and Depth: Dieldrin	3-102
Figure 3-4.h	Profiles of Core Data by River Mile and Depth: Total Chlordane	3-103
Figure 3-4.i	Profiles of Core Data by River Mile and Depth: Mercury	3-104
Figure 3-4.j	Profiles of Core Data by River Mile and Depth: Cadmium.....	3-105
Figure 3-4.k	Profiles of Core Data by River Mile and Depth: Copper	3-106
Figure 3-4.l	Profiles of Core Data by River Mile and Depth: Lead	3-107
Figure 3-4.m	Profiles of Core Data by River Mile and Depth: Total Organic Carbons	3-108
Figure 3-4.n	Profiles of Core Data by River Mile and Depth: Fines	3-109
Figure 3-5.a	Surficial Concentration vs. Total Organic Carbon, Linear Scale - 2,3,7,8-TCDD Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-110
Figure 3-5.b	Surficial Concentration vs. Total Organic Carbon, Linear Scale - Total TEQ Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-111
Figure 3-5.c	Surficial Concentration vs. Total Organic Carbon, Linear Scale - Total PCBs Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-112
Figure 3-5.d	Surficial Concentration vs. Total Organic Carbon, Linear Scale - HMW PAHs Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-113
Figure 3-5.e	Surficial Concentration vs. Total Organic Carbon, Linear Scale - LMW PAHs Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-114
Figure 3-5.f	Surficial Concentration vs. Total Organic Carbon, Linear Scale - Total DDx Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-115
Figure 3-5.g	Surficial Concentration vs. Total Organic Carbon, Linear Scale - Dieldrin Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only.....	3-116
Figure 3-5.h	Surficial Concentration vs. Total Organic Carbon, Linear Scale - Total Chlordane Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-117
Figure 3-5.i	Surficial Concentration vs. Total Organic Carbon, Linear Scale - Mercury Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only.....	3-118
Figure 3-5.j	Surficial Concentration vs. Total Organic Carbon, Linear Scale - Cadmium Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-119
Figure 3-5.k	Surficial Concentration vs. Total Organic Carbon, Linear Scale - Copper Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only.....	3-120

Figure 3-5.l	Surficial Concentration vs. Total Organic Carbon, Linear Scale - Lead Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-121
Figure 3-5.m	Surficial Concentration vs. Total Organic Carbon, Linear Scale - Percent Fines Surficial Sediments (0.0 ft to 0.5 ft), 2008 LRC Cores Only	3-122
Figure 3-6.a	Depth Profiles of 2,3,7,8-TCDD with Cesium-137 and Percent Fines	3-123
Figure 3-6.b	Depth Profiles of Total TEQ with Cesium-137 and Percent Fines	3-124
Figure 3-6.c	Depth Profiles of Total PCBs with Cesium-137 and Percent Fines.....	3-125
Figure 3-6.d	Depth Profiles of Total HMW PAHs with Cesium-137 and Percent Fines	3-126
Figure 3-6.e	Depth Profiles of Total LMW PAHs with Cesium-137 and Percent Fines.....	3-127
Figure 3-6.f	Depth Profiles of Total DDx with Cesium-137 and Percent Fines.....	3-128
Figure 3-6.g	Depth Profiles of Dieldrin with Cesium-137 and Percent Fines.....	3-129
Figure 3-6.h	Depth Profiles of Total Chlordane with Cesium-137 and Percent Fines	3-130
Figure 3-6.i	Depth Profiles of Mercury with Cesium-137 and Percent Fines	3-131
Figure 3-6.j	Depth Profiles of Cadmium with Cesium-137 and Percent Fines	3-132
Figure 3-6.k	Depth Profiles of Copper with Cesium-137 and Percent Fines	3-133
Figure 3-6.l	Depth Profiles of Lead with Cesium-137 and Percent Fines	3-134
Figure 3-6.m	Depth Profiles of Total Organic Carbon with Cesium-137 and Percent Fines	3-135
Figure 3-6.n	Depth Profiles of Unsupported Pb-210 with Cesium-137 and Percent Fines	3-136
Figure 3-7	Outlier Evaluation Process Chart.....	3-137
Figure 3-8.a	Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations: 2,3,7,8-TCDD	3-138
Figure 3-8.b	Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations: Total TEQ	3-139
Figure 3-8.c	Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations: Total PCBs	3-140
Figure 3-8.d	Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations: Total HMW PAHs.....	3-141
Figure 3-8.e	Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations: Total LMW PAHs	3-142
Figure 3-8.f	Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations: Total DDx.....	3-143
Figure 3-8.g	Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations: Dieldrin	3-144
Figure 3-8.h	Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations: Total Chlordane.....	3-145
Figure 3-8.i	Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations: Mercury.....	3-146
Figure 3-8.j	Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations: Cadmium	3-147
Figure 3-8.k	Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations: Copper.....	3-148

Figure 3-8.l	Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations: Lead.....	3-149
Figure 3-8.m	Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations: Total Organic Carbon.....	3-150
Figure 4-1	AVS Qualification Summary.....	4-18
Figure 4-2	Metals SEM Qualification Summary	4-19
Figure 4-3	Mercury SEM Qualification Summary.....	4-20
Figure 4-4	Butyltin Qualification Summary	4-21
Figure 4-5	PCDDs/PCDFs Qualification Summary.....	4-22
Figure 4-6	Ammonia Qualification Summary	4-23
Figure 4-7	Cyanide Qualification Summary.....	4-24
Figure 4-8	Phosphorus Qualification Summary	4-25
Figure 4-9	Sulfide Qualification Summary.....	4-26
Figure 4-10	TKN Qualification Summary.....	4-27
Figure 4-11	TOC Qualification Summary	4-28
Figure 4-12	Grain Size Qualification Summary.....	4-29
Figure 4-13	Herbicide Qualification Summary.....	4-30
Figure 4-14	Hexavalent Chromium Qualification Summary	4-31
Figure 4-15	Mercury Method 1631E Qualification Summary.....	4-32
Figure 4-16	Methyl Mercury Qualification Summary.....	4-33
Figure 4-17	Metals Method 6010B Qualification Summary	4-34
Figure 4-18	Metals Method 6020 Qualification Summary.....	4-35
Figure 4-19	Selenium Method 7740 Qualification Summary	4-36
Figure 4-20	PAHs by HRGC/LRMS-SIM Qualification Summary	4-37
Figure 4-21	PCB Aroclors Qualification Summary	4-38
Figure 4-22	PCB Congeners Qualification Summary	4-39
Figure 4-23	Pesticides by GC/ECD Qualification Summary	4-40
Figure 4-24	Pesticides by HRGC/HRMS Qualification Summary	4-41
Figure 4-25	Alpha Isotope (Pb-210 as Po-210) Qualification Summary	4-42
Figure 4-26	Gamma Isotopes (Be-7, Cs-137, K-40, Ra-226) Qualification Summary.....	4-43
Figure 4-27	SVOC Qualification Summary.....	4-44
Figure 4-28	TPH-Extractables Qualification Summary	4-45
Figure 4-29	TPH-Purgeables Qualification Summary.....	4-46
Figure 4-30	VOC Qualification Summary	4-47
Figure 4-31	Laboratory Completeness Summary	4-48

1.0 Introduction

The Lower Passaic River Study Area (LPRSA) encompasses the 17.4-mile tidal stretch of the Lower Passaic River and its tributaries from Dundee Dam to Newark Bay (**Figure 1-1**). The LPRSA is an operable unit of the Diamond Alkali Superfund Site. A Remedial Investigation/Feasibility Study (RI/FS), originally begun by the United States Environmental Protection Agency (USEPA), is currently underway for the LPRSA in accordance with:

- The *Lower Passaic River Restoration Project Work Plan* (Work Plan) (Malcolm Pirnie, Inc. [MPI] 2005a);
- The *Lower Passaic River Restoration Project Field Sampling Plan Volume 1* (FSP1) (MPI 2006);
- The *Lower Passaic River Restoration Project Draft Field Sampling Plan Volume 2* (FSP2) (MPI et al. 2006);
- The *Lower Passaic River Restoration Project Revised Preliminary Draft Field Sampling Plan Volume 3* (FSP3) (MPI 2005b); and
- The *Lower Passaic River Restoration Project Quality Assurance Project Plan* (QAPP) (MPI 2005c).

In May 2007, USEPA entered into an agreement with the Cooperating Parties Group (CPG), which comprises the companies identified as Potentially Responsible Parties (PRPs). The Administrative Settlement Agreement and Order on Consent [Settlement Agreement]; (USEPA 2007) requires the Settling Parties to complete a comprehensive study of contamination and possible remedial approaches for the LPRSA under the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) (USEPA 1980). The RI/FS is being conducted under the Settlement Agreement and includes the scopes of work identified in FSP1 (MPI 2006), FSP2 (MPI et al. 2006), and FSP3 (MPI 2005b).

This CERCLA RI/FS is one component of the overall Lower Passaic River Restoration Project (LPRRP). The LPRRP is a joint CERCLA and Water Resources Development Act project. Several other federal and state agencies are participating in the project, which include the United States Army Corps of Engineers (USACE), New Jersey Department of Transportation (NJDOT), National Oceanic and Atmospheric Administration, United States Fish and Wildlife Service, and New Jersey Department of Environmental Protection (NJDEP), collectively referred to as the "Partner Agencies."

The Low Resolution Coring (LRC) program was developed in accordance with the *Guidance for Conducting Remedial Investigations and Feasibility Studies under CERCLA* (USEPA 1988a) and the Settlement Agreement to determine the nature and extent of contamination, including identification of potential source areas, and to characterize physical characteristics of the sediment of the 17.4-mile LPRSA. The mouth of the Lower Passaic River (LPR) is defined as River Mile (RM) 0, and was established by a northeast-southwest line drawn from just east of Kearny Point at the north side of the river to a point at the south side of the river in the City of Newark. This line also establishes the boundary between the LPRSA and Newark Bay.

This report summarizes the results of the LRC investigation performed in response to the Low Resolution Sediment Coring task (defined in Chapter 5.0 of FSP1 [MPI 2006]). The scope of work is consistent with the scope outlined in FSP1 (MPI 2006). Field and analytical details for the initiation of the LRC task are described in the *Quality Assurance Project Plan RI Low Resolution Coring/Sediment Sampling* (ENSR 2008a), which serves as an addendum to FSP1, and is henceforth referred to as the LRC QAPP. The LRC QAPP Revision 1 was approved for implementation by USEPA on July 18, 2008. Subsequently, three revisions (Revision 2 submitted July 24, 2008, Revision 3 submitted July 29, 2008, and Revision 4 submitted October 20, 2008) have been incorporated in the LRC QAPP. The "low resolution" in LRC refers to the relative thickness of the sediment slices analyzed during the field

sampling program. For the LRC program, the thickness of the sediment interval submitted for analysis varied from 6 inches (at the surface) to 2 feet. “Low resolution” is in contrast to “high resolution” core segmentation that might result in intervals as fine as a few centimeters (cm). The LRC sediment sampling also included eight grab samples that were collected using high resolution segmentation.

A Characterization Summary is required after each field investigation task per the Statement of Work in the Settlement Agreement (Section B.5.d. on page 6). In accordance with the *Guidance for Conducting Remedial Investigations and Feasibility Studies under CERCLA* (USEPA 1988a), this report presents the methods of data collection and field and analytical findings of the LRC program for the LPRSA.

This report consists of the following chapters, which are consistent with the outline for a site characterization summary provided in the Settlement Agreement:

- Executive Summary.
- Chapter 1.0 covers the history and background of the LPRRP, including the scope of the LRC component and the Data Quality Objectives (DQOs) established for this component.
- Chapter 2.0 includes details of the field implementation of the LRC program, including sample collection and processing, sample analysis, data collection and validation, and quality assurance/quality control (QA/QC) measures.
- Chapter 3.0 presents analytical sample results for chemical, physical, and radioisotope parameters, shown through tabular and graphical displays.
- Chapter 4.0 provides an assessment of data usability.
- Chapter 5.0 provides document references.

Tables and figures can be found at the end of each section and all appendices follow the body of the main text. This LRC Characterization Summary is one component in completing the RI/FS and fulfilling the DQOs established for the LRC program, as defined in the LRC QAPP (ENSR 2008a).

1.1 Environmental History and Setting

The LPRSA has been highly urbanized through the development of residential areas and industrial activities. **Figure 1-1** presents a map of the LPRSA. Changes in the LPR and watershed that accompanied European settlement and industrialization of the area to present day are well chronicled (Iannuzzi et al. 2002). Most of the tidal marsh, mudflats, shallow nearshore areas, and tidal wetlands historically present in the LPRSA have been either filled or dredged. Today, much of the shoreline in the LPRSA consists of riprap and sheet pile walls, resulting in a highly channelized river. Upper portions of the LPRSA feature generally steeper and modified shorelines on the west banks with limited areas of riparian vegetation. The east bank is less modified, consisting of more natural shoreline, residential areas, and parks.

1.1.1 History of the LPR

More than 200 years of industrialization and urbanization have had a substantial effect on the LPR watershed, which was an important location for industry during the American Industrial Revolution (MPI 2007a). These early industries, as well as other industries that developed during the 19th and early 20th centuries, used the LPR for process water and waste disposal, which adversely affected water and sediment quality (Iannuzzi and Ludwig 2004). In addition, overall sediment and water quality is impaired as a result of historical direct municipal discharges, historical and continuing surface runoff, and municipal combined sewer overflows (CSOs) and storm water outfalls. These impacts to general water quality were reduced in 1970 when the Clean Water Act was passed (Iannuzzi and Ludwig 2004).

In 1858, the Dundee Dam and associated locks were constructed. After the completion of the dam, mills were built along the upper LPR near the City of Passaic (Iannuzzi et al. 2002). In the early 20th Century, Newark, New Jersey, became one of the largest industrial cities in the United States. Industries included petroleum refineries, shipping facilities, tanneries, and various manufacturers (Battelle 2005). Above Dundee Dam, the City of Paterson was a significant center of industrialization and manufacturing beginning in the late 18th Century.

Approximately 88 percent of the wetlands near the LPR and Newark Bay were lost after 1816 (Iannuzzi et al. 2002). These wetland areas were ditched, diked, drained, and covered with fill material for various purposes including: salt hay production, gardens and dairies, railroad beds, oil storage/refining, shipyards and shipping ports, mosquito control, municipal and industrial waste disposal, and airport development (Iannuzzi et al. 2002). Dredging in the LPR began in 1874 and continued until 1983, but only maintenance dredging occurred after 1940 (Iannuzzi and Ludwig 2004; MPI 2007a). The dredging allowed for commercial shipping and for deeper-draft ships to dock in the lower section of the LPR.

The LPRSA is an operable unit of the Diamond Alkali Superfund Site. In 1984, the Diamond Alkali Superfund Site was placed on the National Priorities List as a result of past industrial operations at the Diamond Alkali plant (80/120 Lister Avenue in Newark, New Jersey), which resulted in the release of hazardous substances such as polychlorinated dibenzo-*p*-dioxins (PCDDs) and pesticides. Sampling of Passaic River sediments conducted during the RI/FS for the Diamond Alkali plant revealed numerous organic and inorganic compounds including, but not limited to, PCDDs and polychlorinated dibenzofurans (PCDFs), pesticides, polychlorinated biphenyls (PCBs), polycyclic aromatic hydrocarbons (PAHs), and metals. In 1994, an investigation of a 6-mile stretch of the Passaic River centered on the Diamond Alkali plant was begun. Sampling showed that the sediments throughout the 6-mile stretch and beyond were contaminated with organic and inorganic substances, and were being potentially dispersed by the tidal nature of the LPR. Therefore, in 2001, USEPA expanded the scope of the Superfund study to encompass the 17.4-mile stretch of the Passaic River and added a large number of PRPs for historical releases that potentially contributed to the chemicals found in the river.

1.1.2 Physical Setting of the LPRSA

Portions of the LPR below Dundee Dam can be characterized as a stratified estuary. The LPRSA receives inflows of marine (salt) water from Newark Bay and fresh water from the Upper Passaic River (UPR) (UPR; above Dundee Dam), tributaries, surface run-off, CSOs, and storm water outfalls located below Dundee Dam. The less dense fresh water flows downstream over the tidally influenced salt water that, on the flood tide, moves upstream from Newark Bay.

The current conceptual site model (MPI 2007b) has divided the LPRSA into three river sections. The salinity regimes associated with these river sections are based on MPI (2007b):

- Freshwater River Section (RM 10 to RM 17.4) is the region usually upstream of the salt front (based on initial model simulations conducted by Moffatt and Nichol (2009): the salt front appears to rarely extend further upstream than RM 13 and is upstream of RM 10 typically about 10 percent of the time).
- Transitional River Section (RM 6 to RM 10) is characterized by the most frequent location of the salt front, with water conditions varying from slightly brackish (or oligohaline, with salinity values ranging from 0.5 parts per thousand (ppt) to 5 ppt to moderately brackish (or mesohaline, with salinity values ranging from 5 ppt to 18 ppt).
- Brackish River Section (RM 0 to RM 6) is located downstream of the typical location of the salt front, with almost always moderately brackish conditions (mesohaline, with salinity values ranging from 5 ppt to 18 ppt).

The exact extent of the salt wedge (i.e., a wedge-shaped intrusion of salt water into the estuary that slopes downward in the upstream direction) is dependent on the phase of the tide and the volume of

fresh water flowing downstream. In general, the salt wedge extends further upstream during spring flood tides and low river flow; the leading edge of the salt wedge is pushed further downstream during high river-flow events. The exact extent of the salt wedge within the LPRSA is uncertain at this time because salinity data have not been routinely collected above RM 10, and that location was shown to have a maximum salinity between 3 ppt and 6 ppt during the summer of 2005 (MPI 2007b). Additional water column monitoring for salinity, as well as for other physical and chemical characteristics, are underway as part of FSP1 activities.

The LPRSA is relatively shallow, with maximum thalweg depths ranging from a few feet (upper portions below Dundee Dam) to 30 feet near the mouth of the river. A federally authorized navigation channel exists between the mouth of the river and approximately RM 15.4 (USACE 2008). Sediment grain size in the main stem of the LPRSA below Dundee Dam consists of fine (silts and sands) to coarse material (gravel or rock). Coarser grained material occurs in the upstream reaches, with a larger proportion of fine material (silts and fine sand) in the lower reaches to the mouth (MPI et al. 2006). Some deviations from this trend are found in lower areas of the LPRSA where steepened shorelines have been armored and this material is found in the channel, in erosional areas associated with bridge abutments, and near river bends.

1.2 Data Quality Objectives for the LRC Program

The DQO process is used to establish performance and acceptance criteria, which serve as the basis for designing a plan for collecting data of sufficient quality and quantity to support the goals of the study. Use of the DQO process leads to efficient and effective expenditure of resources; consensus on the type, quality, and quantity of data needed to meet the project goals; and the full documentation of actions taken during the development of the project (USEPA 2006a). DQOs are intended to provide a systematic approach for defining criteria that a data collection design should satisfy, including when, where, and how to collect samples or measurements. The DQO process is a seven-step iterative planning approach that results in clearly defined goals for a project.

The document, Guidance on Systematic Planning Using the Data Quality Objectives Process (USEPA 2006a), was used to develop the DQOs for the LRC investigation as presented in the LRC QAPP (ENSR 2008a). The DQOs define the decision to which the data would contribute and specify the overall degree of data quality or uncertainty the decision maker is willing to accept during the decision making process.

Two primary DQOs for the LRC program were identified in the LRC QAPP (ENSR 2008a) and FSP1 (MPI 2006):

1. Develop an understanding of the physical characteristics of sediment (DQO 1); and
2. Characterize the nature and extent of sediment impacts, including identification of potential source areas (DQO 2).

The complete seven-step process is presented in **Appendix A** without modification from its original presentation in the LRC QAPP (ENSR 2008a). The decision statements associated with these DQOs, including whether more field data collection and analysis are necessary and whether a particular area of sediment is stable or not, will be addressed in subsequent reports and, therefore, are not discussed further in this document.

1.3 LRC Program Design

The LRC program provides extensive spatial coverage of sediment sampling along the entire 17.4-mile study area and within the tributaries of the LPR. In addition, samples have been collected from areas outside the LPR itself, and also outside the boundary of the LPRSA. These areas include the Passaic River above Dundee Dam and the former Dundee Canal and Weasel Brook. As stated in the LRC QAPP

(ENSR 2008a), the field and laboratory data collected during this program will be used in the RI/FS process to:

- Provide a comprehensive characterization of the nature and extent of sediment contamination within the LPRSA;
- Aid in the characterization of potential sources of contaminants;
- Provide a comprehensive physical characterization of sediment within the LPRSA; and
- Aid in the refinement of the identification and characterization of erosional and depositional zones.

A total of 115 sampling locations were proposed for this investigation, including 98 stations in the LPR; 7 stations above Dundee Dam; 3 stations on each of the Second, Third, and Saddle rivers; and 1 station on the unnamed creek. An additional three locations in the former Dundee Canal and Weasel Brook were proposed for sampling in December 2008, bringing the total number of target locations to 118 (FM-081206 Rev 1, approved December 15, 2008, by USEPA). At the completion of the program, sediment cores were successfully collected at 110 locations. Sampling locations were chosen to provide representative spatial coverage to examine nature and extent of contamination in the LPRSA, identify potential source areas, and gather physical characteristics data to understand sediment stability over the full study area (ENSR 2008a). **Figure 1-2** includes the proposed locations along with the actual locations of samples. The actual locations vary in some instances due to relocations, as discussed in Chapter 2.0 for RM 0 and RM 1, and where needed during field implementation to obtain acceptable cores in accordance with Standard Operating Procedures (SOPs) (ENSR 2008a, Appendix B). Included in **Figure 1-2** are features that guided sample location selection, such as the pilot dredge location, utilities, and CSO locations. **Figure 1-3** provides the same information on one figure.

The proposed sample locations, along with the purpose of each location and target station coordinates, are presented in **Table 1-1**. Target coring depths (also presented in **Table 1-1**) for each station were developed based on a review of available geotechnical boring, core, and probe data from the LPRSA and Newark Bay and were selected to effectively characterize the potential thickness of contaminated sediment within the LPRSA. Note that **Table 1-1** is reproduced without modification from the LRC QAPP (ENSR 2008a). Changes from this planned effort are discussed in Chapter 2.0. For example, former Dundee Canal and Weasel Brook samples were not proposed in the initial sampling program and are not included in **Table 1-1**.

Coring was proposed at all locations. Low resolution cores were intended to penetrate to the red-brown sand or clay/silt, or to refusal. The red-brown sand or clay/silt layers are expected to be below impacted sediment layers and represent native, non impacted material. Refusal is defined as the depth at which no additional penetration can be achieved using vibracoring in a 1-minute period. Surface grab samples also were proposed at each coring location to ensure adequate sample volume for radiochemical parameters and as required for analytes such as volatile organic compounds (VOCs) in the surface interval (defined as 0 to 6 inches).

To address a component of FSP1 (i.e., Task 5.3.3), 8 locations were selected for collection of finer segmented samples in the top 2 feet of the core, at intervals of 0 to 2 cm, 2 to 5 cm, 5 to 10 cm, 10 to 30 cm, and 30 to 61 cm. This “core top” sampling was conducted to address whether high resolution of the sediment cores was useful to support the LPR/Newark Bay modeling and risk assessment data needs. Core and grab sampling (discussed in the prior paragraph) were completed at these eight locations as well.

Field data collection and laboratory analyses were completed in accordance with the approved LRC QAPP (ENSR 2008a) and standard of practice for environmental assessments. Details of the field program implementation are provided in Chapter 2.0.

Table 1-1 Proposed Sampling Locations
Presented without Modification from the LRC QAPP (ENSR 2008a, Table 1 of Appendix A)

Station Location			Previous Characterization/Siting Rationale							Target Core Length/Analyses			NAD 83 NJ State Plane Ft	
River Mile	Station ID	Station #	Water Depth ¹ (National Geodetic Vertical Datum [NGVD] ft)	Geomorphic region ²	Surficial sediment type ³	Subsurface sediment type ⁴	Preliminary Estimate (Qualitative) erosion/deposition ⁵	Co-located with [Located nearby]	Siting rationale ¹⁰	Estimated Length (ft)	Rationale for Target Length ⁴	Analyses ⁶	Easting	Northing
RM 0 -2.2 Point-No-Point Reach - last dredged to 30 ft depth, 300 ft width in 1983														
0	2008 CLRC-001	1	-25	channel	silt	silt over clay	depos.-static	[geotech 1A]	half mile transect/ determine nature and extent	10	transition from silt to clay	A, B	597505	682497
0	2008 CLRC-002	2	-5!	mudflat	silt-sand	Not determined (ND)	depos.-static		half mile transect/ determine nature and extent	20	initial data	A	598286	683951
0	2008 CLRC-003	3	-5!	mudflat	silt-sand	ND	depos.-static		half mile transect/ determine nature and extent	20	initial data	A	599310	685714
0.05	2008 CLRC-004	4	-19	side channel	silt	ND	depositional		side channel sample/ determine nature and extent	20	initial data	A	597078	683257
0.25	2008 CLRC-005	5	-24	channel	silt	ND	depos.-static		lack of previous data and historical depositional area/ determine nature and extent	10	initial data	A	596969	684208
0.25	2008 CLRC-006	6	-19*	mudflat	silt-sand	ND	depos.-static		lack of previous data and historical depositional area/ determine nature and extent	20	initial data	A	597726	685164
0.25	2008 CLRC-007	7	-3!	mudflat	silt-sand	ND	depos.-static		lack of previous data and historical depositional area/ determine nature and extent	20	initial data	A, B	598383	686011
0.35	2008 CLRC-008	8	-15	side channel	silt	ND	depositional		side channel sample/ determine nature and extent	20	initial data	A	596614	685405
0.5	2008 CLRC-009	9	-24	channel	silt	ND	depos.-static		half mile transect/ determine nature and extent	10	initial data	A	596737	686124
0.5	2008 CLRC-010	10	-4	mudflat	silt-sand	ND	depos.-static		half mile transect/ determine nature and extent	20	initial data	A	597168	686354
0.5	2008 CLRC-011	11	-3	mudflat	silt-sand	ND	depos.-static		half mile transect/ determine nature and extent	20	initial data	A	597909	686696
0.67	2008 CLRC-012	12	-12	side channel	silt	ND	depositional		side channel sample/ determine nature and extent	20	initial data	A	596647	687125
0.75	2008 CLRC-013	13	-19	channel	silt	silt over clay	depos.-static	[geotech 1A-B]	lack of previous data and historical depositional area/ determine nature and extent	18	transition from silt to clay	A	596898	687639
0.75	2008 CLRC-014	14	-3	mudflat	silt-sand	ND	depos.-static	[geotech 1A-B]	lack of previous data and historical depositional area/ determine nature and extent	20	initial data	A	597430	687665

Table 1-1 Proposed Sampling Locations (Continued)
Presented without Modification from the LRC QAPP (ENSR 2008a, Table 1 of Appendix A)

Station Location			Previous Characterization/Siting Rationale							Target Core Length/Analyses			NAD 83 NJ State Plane Ft	
River Mile	Station ID	Station #	Water Depth ¹ (National Geodetic Vertical Datum [NGVD] ft)	Geomorphic region ²	Surficial sediment type ³	Subsurface sediment type ⁴	Preliminary Estimate (Qualitative) erosion/ deposition ⁵	Co-located with [Located nearby]	Siting rationale ¹⁰	Estimated Length (ft)	Rationale for Target Length ⁴	Analyses ⁶	Easting	Northing
1.1	2008 CLRC-015	15	-5*	side channel	silt	silt over peat or sand	depositional	[Tierra 201]	half mile transect adjusted upstream due to bridge, Roanoke Ave combined sewer outfall (CSO)/ determine nature and extent/ potential source identification	10	transition from silt to peat or sand	A	597193	689657
1.1	2008 CLRC-016	16	-16	channel	silt	silt over sand	depos.-static	[Tierra 202, geotech core 2B]	half mile transect adjusted upstream due to bridge	15	transition from silt to sand or clay	A	597437	689554
1.1	2008 CLRC-017	17	-7	side channel	silt	silt over sand	depos.-static	[Tierra Core 203, HRC 5A]	half mile transect adjusted upstream due to bridge/ determine nature and extent/ adjusted to colocate with high resolution core (HRC) 5A where chemistry was not completed	15	transition from silt to sand	A	597667	689292
1.45	2008 CLRC-018	18	-6	side channel	silt	silt over sand	depositional	Tierra 207 [geotech 2A]	one mile transect/ determine nature and extent	15	extend Tierra core to sand or clay	A	597701	691423
1.45	2008 CLRC-019	19	-17	channel	silt	silt	depos.-static	Tierra 208 [geotech 2B]	one mile transect/ determine nature and extent	5	Tierra 208 was a completed core, therefore the recent sediments only will be analyzed, estimated to be 5 feet or less.	A,D	597976	691370
1.45	2008 CLRC-020	20	-6	side channel	silt	silt over sand	depos.-static	Tierra 209 [geotech 2C, HRC7]	one mile transect/ determine nature and extent	15	extend Tierra core to sand or clay	A	598203	691321
1.9	2008 CLRC-021	21	-22	channel	silt	silt	potentially erosional	Tierra 214	EPA requested location in this area due to high historical concentration and incomplete mercury inventory	15	extend Tierra core to sand or clay	A,B	598324	693855
RM 2.2-4.4 Harrison Reach - last dredged to 20 ft depth, 300 ft width in 1949														
2.62	2008 CLRC-022	22	-2	mudflat	silt	silt	depositional -static	Tierra 284	one mile transect (relocated due to underground gas lines and bridge crossing), co-located with Tierra 284 to complete nature and extent determination	15	silt to sand or clay transition	A,D	595458	695202

Table 1-1 Proposed Sampling Locations (Continued)
Presented without Modification from the LRC QAPP (ENSR 2008a, Table 1 of Appendix A)

Station Location			Previous Characterization/Siting Rationale							Target Core Length/Analyses			NAD 83 NJ State Plane Ft	
River Mile	Station ID	Station #	Water Depth ¹ (National Geodetic Vertical Datum [NGVD] ft)	Geomorphic region ²	Surficial sediment type ³	Subsurface sediment type ⁴	Preliminary Estimate (Qualitative) erosion/ deposition ⁵	Co-located with [Located nearby]	Siting rationale ¹⁰	Estimated Length (ft)	Rationale for Target Length ⁴	Analyses ⁶	Easting	Northing
2.62	2008 CLRC-023	23	-13	channel	silt	silt	depositional	[Tierra 223]	one mile transect (relocated due to underground gas lines and bridge crossing), located near Tierra 223 to complete nature and extent determination	15	silt to sand or clay transition	A	595563	695459
2.62	2008 CLRC-024	24	-16	side channel	silt	silt	depositional	Tierra 224	one mile transect (relocated due to underground gas lines and bridge crossing), colocated with Tierra 224 to complete nature and extent determination	15	silt to clay transition	A	595561	695766
2.85	2008 CLRC-025	25	-10	Channel, dredge area	silt	silt over sand	depositional	Tierra 227 [LRC 1, geotech 3C]	colocated with Tierra 227 to complete nature and extent determination	10	silt to sand transition	A	594361	695470
3.15	2008 CLRC-026	26	-1	side/flat	silt and sand	silt	depositional	[Tierra grabs 2000 5sdm, 1999 5sdm]	Tierra grabs on mudflat/ determine nature and extent	15	initial data	A, B	592599	695423
3.51	2008 CLRC-027	27	-11	side channel	silt	silt over sand	erosional	Tierra 234 [LRC3]	one mile transect/ colocated with Tierra 234 to complete nature and extent determination	15	silt to sand transition	A	591239	694157
3.51	2008 CLRC-028	28	-16	channel	silt	silt	erosional	Tierra 235	one mile transect/ colocated with Tierra 235 to complete nature and extent determination	10	silt to sand transition	A,D	591151	694213
3.51	2008 CLRC-029	29	-16	side channel	silt	silt over clay	erosional	Tierra 236 [HRC 17]	one mile transect/ colocated with Tierra 236 to complete nature and extent determination	10	silt to sand/clay transition	A	591048	694264
RM 4.4-5.8 Newark Reach - last dredged to 16 ft depth, 300 ft width in 1949														
4.2	2008 CLRC-115	115	-15	side	silt and sand	silt	depositional-static	Tierra 243	EPA requested additional location for determination of nature and extent	10	silt to sand/clay transition	A,D	588403	692312
4.25	2008 CLRC-030	30	-13	side channel	sand and silt	silt	potentially erosional	[Tierra 243]	one mile transect, relocated per EPA request to this area of potential high contaminant inventory	10	silt to sand/clay transition	A	588236	692271
4.25	2008 CLRC-031	31	-15	channel	silt	silt	depositional -static	[Tierra 244]	one mile transect, relocated per EPA request to this area of potential high contaminant inventory	10	silt to sand/clay transition	A	588233	692388
4.25	2008 CLRC-032	32	-10	side channel	silt	silt	depositional -static	[Tierra 245, LRC 5]	one mile transect, relocated per EPA request to this area of potential high contaminant inventory	15	silt to sand/clay transition	A	588227	692539

Table 1-1 Proposed Sampling Locations (Continued)
Presented without Modification from the LRC QAPP (ENSR 2008a, Table 1 of Appendix A)

Station Location			Previous Characterization/Siting Rationale							Target Core Length/Analyses			NAD 83 NJ State Plane Ft	
River Mile	Station ID	Station #	Water Depth ¹ (National Geodetic Vertical Datum [NGVD] ft)	Geomorphic region ²	Surficial sediment type ³	Subsurface sediment type ⁴	Preliminary Estimate (Qualitative) erosion/ deposition ⁵	Co-located with [Located nearby]	Siting rationale ¹⁰	Estimated Length (ft)	Rationale for Target Length ⁴	Analyses ⁶	Easting	Northing
5	2008 CLRC-033	33	-16	channel	silt	silt over sand	static	[MPI] geotech 6B, Tierra grab 9909sdu]	multiple CSOs/ potential source identification/ determine nature and extent	10	silt to sand transition	A	585378	694444
5.3	2008 CLRC-034	34	-18	channel	silt	silt over gravel	depos.-erosional	[Tierra 259, LRC 7]	multiple CSOs/ potential source identification/ determine nature and extent	5	silt to gravel transition	A,B,D	584862	695962
5.5	2008 CLRC-035	35	-13	side channel	silt and sand	silt	static	Tierra 262	one mile transect, downstream from Orange St. CSO/potential source determination/ confirmation of nature and extent in Tierra262	5	Tierra 262 was a completed core, therefore the recent sediments only will be analyzed, estimated to be 5 feet or less.	A	584733	697058
5.5	2008 CLRC-036	36	-24	channel	silt and sand	silt over gravel	static	Tierra 261	one mile transect/ colocated with Tierra 261 to complete nature and extent determination	10	silt to gravel transition	A	584571	697029
5.5	2008 CLRC-037	37	-15	side channel	silt and sand	silt over gravel	static	Tierra 263	one mile transect, downstream from New Street CSO/ potential source identification/ colocated with Tierra 263 to complete nature and extent determination	10	silt to gravel transition	A	584808	697060
RM 5.8-6.8 Kearny Reach - last dredged to 16 ft depth, 300 ft width in 1950														
6	2008 CLRC-038	38	-15	side channel	silt	silt	static	[Tierra 269]	Below 2 CSOs ⁹ / potential source identification/ determine nature and extent	15	extend Tierra core to sand or clay	A	585066	699604
6.3	2008 CLRC-039	39	-10	side channel	silt	silt, peat/organic matter	depositional	Tierra 272	At CSO/ potential source identification/ colocated with Tierra 272 to complete nature and extent determination	15	extend Tierra core to sand or clay	A	585244	701011
6.5	2008 CLRC-040	40	-16	side channel	silt	silt	erosional-static	Tierra 273	one mile transect/ colocated with Tierra 273 to complete nature and extent determination	5	Tierra 273 was a completed core, therefore the recent sediments only will be analyzed, estimated to be 5 feet or less.	A, B	585518	702181

Table 1-1 Proposed Sampling Locations (Continued)
Presented without Modification from the LRC QAPP (ENSR 2008a, Table 1 of Appendix A)

Station Location			Previous Characterization/Siting Rationale							Target Core Length/Analyses			NAD 83 NJ State Plane Ft	
River Mile	Station ID	Station #	Water Depth ¹ (National Geodetic Vertical Datum [NGVD] ft)	Geomorphic region ²	Surficial sediment type ³	Subsurface sediment type ⁴	Preliminary Estimate (Qualitative) erosion/ deposition ⁵	Co-located with [Located nearby]	Siting rationale ¹⁰	Estimated Length (ft)	Rationale for Target Length ⁴	Analyses ⁶	Easting	Northing
6.5	2008 CLRC-041	41	-16	channel	silt	silt	static	Tierra 274	one mile transect/ colocated with Tierra 274 to complete nature and extent determination	5	Tierra 274 was a completed core, therefore the recent sediments only will be analyzed, estimated to be 5 feet or less.	A	585602	702137
6.5	2008 CLRC-042	42	-14	side of wide channel	silt	silt	static	Tierra 275 [HRC 24A]	one mile transect/ colocated with Tierra 275 to complete nature and extent determination	5	Tierra 275 was a completed core, therefore the recent sediments only will be analyzed, estimated to be 5 feet or less.	A	585643	702116
RM 6.8-17.4 Upstream - last dredged to 16 ft depth, 200 ft width in 1950														
7	2008 CLRC-043	43	-10	side channel	sand	organic material	static		half mile transect/ determine nature and extent	8	red brown clay layer, sand, or refusal ¹¹	A	586932	704435
7	2008 CLRC-044	44	-17	channel	silt	sand	static		half mile transect/ determine nature and extent	8	red brown clay layer, sand, or refusal ¹¹	A	587070	704369
7	2008 CLRC-045	45	-5	side channel	silt	organic material	static		half mile transect/ determine nature and extent	8	red brown clay layer, sand, or refusal ¹¹	A, B	587161	704313
7.45	2008 CLRC-046	46	-10	side channel	silt-sand	ND	static	geotech 8A	half mile transect adjusted to co-locate with geotech cores/ determine nature and extent	8	initial data	A	587705	706679
7.45	2008 CLRC-047	47	-14	channel	silt	ND	static	geotech 8B	half mile transect adjusted to co-locate with geotech cores/ determine nature and extent	8	initial data	A,D	587831	706609
7.45	2008 CLRC-048	48	-2	mudflat	silt	ND	static	geotech 8C	half mile transect adjusted to co-locate with geotech cores/ determine nature and extent	8	initial data	A	587985	706484
7.85	2008 CLRC-049	49	-11	channel	silt	ND	erosional	[HRC 26A]	Second River Joint Meeting ERP/ potential source identification/ determine nature and extent	8	red brown clay layer, sand, or refusal ¹¹	A	589179	708327
7.95	2008 CLRC-050	50	-2	mudflat	silt-sand	ND	depositional		half mile transect adjusted to avoid coarse gravel below Second River / determine nature and extent	8	initial data	A	589357	708818

Table 1-1 Proposed Sampling Locations (Continued)
Presented without Modification from the LRC QAPP (ENSR 2008a, Table 1 of Appendix A)

Station Location			Previous Characterization/Siting Rationale							Target Core Length/Analyses			NAD 83 NJ State Plane Ft	
River Mile	Station ID	Station #	Water Depth ¹ (National Geodetic Vertical Datum [NGVD] ft)	Geomorphic region ²	Surficial sediment type ³	Subsurface sediment type ⁴	Preliminary Estimate (Qualitative) erosion/ deposition ⁵	Co-located with [Located nearby]	Siting rationale ¹⁰	Estimated Length (ft)	Rationale for Target Length ⁴	Analyses ⁶	Easting	Northing
7.95	2008 CLRC-051	51	-13	channel	sand	ND	erosional	EMBM Core #1	half mile transect adjusted to avoid coarse gravel below Second River / determine nature and extent; determine vertical distribution in sediment column	8	initial data	A	589473	708766
7.95	2008 CLRC-052	52	-6*	side channel	coarse	ND	depositional	EMBM Core #2	half mile transect adjusted to avoid coarse gravel below Second River / determine nature and extent; determine vertical distribution in sediment column	8	initial data	A	589616	708721
Second River RM 8.05														
8.1	2008 CLRC-053	53	-14	channel	sand		static		upstream of Second River/ potential source identification/ determine nature and extent	8	initial data	A	589474	709581
8.45	2008 CLRC-054	54	-16	channel	sand	sand/gravel	static		half mile transect, adjusted due to bridge and utility crossing/ determine nature and extent	8	silt to sand transition	A	589586	711235
8.45	2008 CLRC-055	55	-7	side channel	silt	silt over sand	static	MPI 2008 core 2	half mile transect, adjusted due to bridge and utility crossing/ determine nature and extent	8	silt to sand transition, MPI core depth	A,B	589694	711214
9	2008 CLRC-056	56	-16	channel	sand	sand over silt	static		half mile transect/ determine nature and extent	10	probe data silt to sand transition	A	590945	713740
9	2008 CLRC-057	57	-2	side channel	silt	silt over sand/rock	likely erosional		half mile transect/ determine nature and extent	8	probe data silt to sand transition	A	591108	713659
9.4	2008 CLRC-058	58	-8	side channel	silt	silt over sand	static	MPI 2008 EMBM core 5	shoal sample (silt deposit)/ determine nature and extent; determine vertical distribution in sediment column	6	silt to sand transition	A	592071	715758
9.6	2008 CLRC-059	59	-16	channel	silt	silt over silty sand	static		half mile transect, adjusted for fine-grained deposit, at unnamed tributary ⁹ /potential source identification/ determine nature and extent	6	silt to sand transition	A	592264	716454

Table 1-1 Proposed Sampling Locations (Continued)
Presented without Modification from the LRC QAPP (ENSR 2008a, Table 1 of Appendix A)

Station Location			Previous Characterization/Siting Rationale							Target Core Length/Analyses			NAD 83 NJ State Plane Ft	
River Mile	Station ID	Station #	Water Depth ¹ (National Geodetic Vertical Datum [NGVD] ft)	Geomorphic region ²	Surficial sediment type ³	Subsurface sediment type ⁴	Preliminary Estimate (Qualitative) erosion/ deposition ⁵	Co-located with [Located nearby]	Siting rationale ¹⁰	Estimated Length (ft)	Rationale for Target Length ⁴	Analyses ⁶	Easting	Northing
9.6	2008 CLRC-060	60	0*	side / shoal area, minor trib.	silt	silt over sand	static	[MPI 2008 core 6]	half mile transect, adjusted for fine-grained deposit, at unnamed tributary ⁹ /potential source identification/ determine nature and extent	6	silt to sand transition	A	592488	716442
10	2008 CLRC-061	61	-11	channel	sand	sand	ND	MPI 2008 EMBM Core 10	half mile transect/ determine nature and extent determine vertical distribution in sediment column	6	initial data	A	591892	718819
10	2008 CLRC-062	62	-5	side channel	silt	sandy silt	ND	MPI 2008 EMBM Core 10 [HRC 13A]	half mile transect/ determine nature and extent determine vertical distribution in sediment column	15	silt to sand transition	A, D	592093	718741
10.25	2008 CLRC-063	63	-12	side channel	silt	silt over silty sand	ND		silt pocket/ determine nature and extent	6	silt to sand transition	A	592082	720029
10.5	2008 CLRC-064	64	-14	channel	sand		static		half mile transect/ determine nature and extent	6	initial data, coarse material expected	A	592228	721507
10.5	2008 CLRC-065	65	-1*	side shoal	sand		likely static		half mile transect/ determine nature and extent	6	initial data, coarse material expected	A	592388	721477
10.94	2008 CLRC-066	66	-11	channel	sand	sand	depositional	[MPI 2008 EMBM core 13]	half mile transect ⁹ / determine nature and extent determine vertical distribution in sediment column	6	initial data	A	593072	723331
10.94	2008 CLRC-067	67	-1*	mud flat	silt	silt over sand?	static	MPI 2008 EMBM core 14 [HRC 29A]	half mile transect ⁹ / determine nature and extent determine vertical distribution in sediment column	6	silt to sand transition	A, B	593181	723166
Third River RM 11.2														
11.3	2008 CLRC-068	68	-9	side channel	silt and sand	silt over gravel	depositional	MPI 2008 EMBM core 17 [geotech 12B]	upstream of Third River ⁹ / potential source identification/ determine nature and extent determine vertical distribution in sediment column	6	silt to gravel transition	A	595000	724016
11.5	2008 CLRC-069	69	-9	side channel	silt and sand	sandy silt over sand	depositional		half mile transect/ determine nature and extent	6	silt to sand transition	A	595819	724484
11.5	2008 CLRC-070	70	-9	side channel	sand and gravel	ND	depositional		half mile transect, downstream of Rutherford Ave CSO/ potential source identification / determine nature and extent	6	initial data	A	595944	724353

Table 1-1 Proposed Sampling Locations (Continued)
Presented without Modification from the LRC QAPP (ENSR 2008a, Table 1 of Appendix A)

Station Location			Previous Characterization/Siting Rationale							Target Core Length/Analyses			NAD 83 NJ State Plane Ft	
River Mile	Station ID	Station #	Water Depth ¹ (National Geodetic Vertical Datum [NGVD] ft)	Geomorphic region ²	Surficial sediment type ³	Subsurface sediment type ⁴	Preliminary Estimate (Qualitative) erosion/ deposition ⁵	Co-located with [Located nearby]	Siting rationale ¹⁰	Estimated Length (ft)	Rationale for Target Length ⁴	Analyses ⁶	Easting	Northing
11.95	2008 CLRC-071	71	-14	channel	sand	ND	erosional		half mile transect/ determine nature and extent	4	initial data - coarse material expected	A	596759	726685
11.95	2008 CLRC-072	72	-13	channel	sand	ND	depositional		half mile transect/ determine nature and extent	4	initial data - coarse material expected	A	596854	726667
12.3	2008 CLRC-073	73	-8	side channel	silt	silt over sand	depositional	HRC 1A [MPI 2008 cores 19, 20]	examination of results at location of previous cluster of cores to confirm the determination of nature and extent	6	transition to sand	A,B	596913	728361
12.55	2008 CLRC-074	74	-3	channel	sand-gravel	silt over sand	static	HRC 32A	half mile transect, downstream of McDonald Brook/ potential source determination/ determine nature and extent	3	high resolution core was complete, coarse material expected	A	596404	729621
12.55	2008 CLRC-075	75	-16	side channel	gravel	silty sand	static		half mile transect, downstream of McDonald Brook/ potential source determination/ determine nature and extent	6	initial data - coarse material expected	A	596522	729656
12.85	2008 CLRC-076	76	-14	side channel	silt-sand	sand	static		half mile transect, adjusted due to bridge, upstream of McDonald Brook/ determine nature and extent	4	initial data - coarse material expected	A	596110	731058
12.85	2008 CLRC-077	77	-13	side channel	silt-sand	sand	depositional		half mile transect, adjusted due to bridge, upstream of McDonald Brook/ determine nature and extent	4	initial data - coarse material expected	A	596225	731023
13.23	2008 CLRC-078	78	-10	side channel	silt and sand	sand and silty sand	likely erosional		EPA requested location, area coverage ⁹ / determine nature and extent	6	initial data	A,D	596800	732963
13.6	2008 CLRC-079	79	-10	side channel	silty sand	silty sand	erosional	[geotech 14B]	half mile transect/ determine nature and extent	6	initial data	A	597243	734738
13.6	2008 CLRC-080	80	-12	side channel	silty sand	silty sand	erosional	[geotech 14C]	half mile transect, adjusted to siltier area/ determine nature and extent	6	initial data	A	597368	734715
14.1	2008 CLRC-081	81	-16	channel	sand	silt sand	static		half mile transect, 3 CSOs ⁹ / potential source identification/ determine nature and extent	6	probing depth	A	597321	737374

Table 1-1 Proposed Sampling Locations (Continued)
Presented without Modification from the LRC QAPP (ENSR 2008a, Table 1 of Appendix A)

Station Location			Previous Characterization/Siting Rationale							Target Core Length/Analyses			NAD 83 NJ State Plane Ft	
River Mile	Station ID	Station #	Water Depth ¹ (National Geodetic Vertical Datum [NGVD] ft)	Geomorphic region ²	Surficial sediment type ³	Subsurface sediment type ⁴	Preliminary Estimate (Qualitative) erosion/ deposition ⁵	Co-located with [Located nearby]	Siting rationale ¹⁰	Estimated Length (ft)	Rationale for Target Length ⁴	Analyses ⁶	Easting	Northing
14.1	2008 CLRC-082	82	0	mudflat	silt and sand	silt over ?	likely static		half mile transect, 3 CSOs ⁹ / potential source identification/ determine nature and extent	6	probing depth	A, B	597457	737355
14.2	2008 CLRC-083	83	-16	channel	sand	silty sand	depositional	[geotech core 15B]	Weasel Brook (Dundee Canal) ⁹ / potential source identification/ determine nature and extent	6	initial data	A	597459	737973
14.2	2008 CLRC-084	84	-5	mudflat	silt and sand	silty sand	depositional	[geotech core 15C]	Weasel Brook (Dundee Canal) ⁹ / potential source identification/ determine nature and extent	8	silt over sand	A	597562	737988
14.81	2008 CLRC-085	85	-4	side channel	sand	ND	likely static		area coverage/ determine nature and extent	6	initial data	A	599480	736942
15.1	2008 CLRC-086	86	-6	uniform shallow channel	sand	ND	ND		half mile transect, adjusted upstream away from bridge/ determine nature and extent	6	initial data, coarse material expected	A	600476	737112
15.1	2008 CLRC-087	87	-6	uniform shallow channel	sand	ND	ND		half mile transect, adjusted upstream away from bridge/ determine nature and extent	6	initial data, coarse material expected	A	600623	737046
15.5	2008 CLRC-088	88	-5	uniform shallow channel	sand	ND	ND		half mile transect, downstream of Saddle River/ potential source identification/ determine nature and extent	6	initial data, coarse material expected	A, B	600699	739256
15.5	2008 CLRC-089	89	-1	bar/flat	gravel	ND	ND		half mile transect, downstream of Saddle River/ potential source identification/ determine nature and extent	6	initial data, coarse material expected	A	600861	739285
Saddle River RM 15.5														
15.64	2008 CLRC-090	90	0	bar	sand	ND	ND		upstream of Saddle River, downstream of Dundee Island lateral CSO/ potential source identification/ determine nature and extent	6	initial data	A	600361	739764
16	2008 CLRC-091	91	-2	uniform shallow channel	gravel and sand	ND	ND	[geotech 16A]	half mile transect/ determine nature and extent	6	initial data	A	599354	741319
16	2008 CLRC-092	92	-2	uniform shallow channel	gravel and sand	ND	ND	[geotech 16C]	half mile transect/ determine nature and extent	6	initial data	A	599463	741354
16.5	2008 CLRC-093	93	1	uniform shallow channel	gravel and sand	ND	ND		half mile transect, downstream of Fleischer Brook/ determine nature and extent	6	initial data	A	598434	743699

Table 1-1 Proposed Sampling Locations (Continued)
Presented without Modification from the LRC QAPP (ENSR 2008a, Table 1 of Appendix A)

Station Location			Previous Characterization/Siting Rationale							Target Core Length/Analyses			NAD 83 NJ State Plane Ft	
River Mile	Station ID	Station #	Water Depth ¹ (National Geodetic Vertical Datum [NGVD] ft)	Geomorphic region ²	Surficial sediment type ³	Subsurface sediment type ⁴	Preliminary Estimate (Qualitative) erosion/ deposition ⁵	Co-located with [Located nearby]	Siting rationale ¹⁰	Estimated Length (ft)	Rationale for Target Length ⁴	Analyses ⁶	Easting	Northing
16.5	2008 CLRC-094	94	2	uniform shallow channel	gravel and sand	ND	ND		half mile transect, downstream of Fleischer Brook/ determine nature and extent	6	initial data	A	598547	743747
17.1	2008 CLRC-095	95	4*	uniform shallow channel	gravel and sand	ND	ND		half mile transect, adjusted north of river and island/ determine nature and extent	6	initial data	A	596669	746040
17.1	2008 CLRC-096	96	3*	uniform shallow channel	gravel and sand	ND	ND		half mile transect, adjusted north of river and island/ determine nature and extent	6	initial data	A	596784	746212
17.35	2008 CLRC-097	97	10*	uniform shallow channel	gravel and sand	ND	ND		uppermost LPR, below dam/ determine nature and extent	6	initial data	A	595533	746798
Above Dundee Dam														
>17.4	2008 CLRC-098	98	ND	Lake	silt and organic matter	ND	ND		Dundee Lake ⁷ /potential upgradient source identification/ determine nature and extent	8	initial data	A	595077	747203
>17.4	2008 CLRC-099	99	ND	Lake	silt and organic matter	ND	ND		Dundee Lake ⁷ /potential upgradient source identification/ determine nature and extent	8	initial data	A	594943	747037
>17.4	2008 CLRC-100	100	ND	Lake	silt and organic matter	ND	ND		Dundee Lake, CSO (Garden state paper) ⁷ / potential upgradient source identification/determine nature and extent	8	initial data	A, B	594601	747934
>17.4	2008 CLRC-101	101	ND	Lake	silt and organic matter	ND	ND		Dundee Lake ⁷ /potential upgradient source identification/ determine nature and extent	8	initial data	A	594316	747817
>17.4	2008 CLRC-102	102	ND	Lake	silt and organic matter	ND	ND		Dundee Lake ⁷ /potential upgradient source identification/ determine nature and extent	8	initial data	A	594035	747696
>17.4	2008 CLRC-103	103	ND	Lake	silt and organic matter	ND	ND		Dundee Lake behind Island (backwater)/ potential upgradient source identification/ determine nature and extent	8	initial data	A	594080	748441
>17.4	2008 CLRC-104	104	ND	Lake	silt and organic matter	ND	ND		Dundee Lake ⁷ /potential upgradient source identification/ determine nature and extent	8	initial data	A	594346	751403

Table 1-1 Proposed Sampling Locations (Continued)
Presented without Modification from the LRC QAPP (ENSR 2008a, Table 1 of Appendix A)

Station Location			Previous Characterization/Siting Rationale							Target Core Length/Analyses			NAD 83 NJ State Plane Ft	
River Mile	Station ID	Station #	Water Depth ¹	Geomorphic region ²	Surficial sediment type ³	Subsurface sediment type ⁴	Preliminary Estimate	Co-located with [Located nearby]	Siting rationale ¹⁰	Estimated	Rationale for Target Length ⁴	Analyses ⁶	Easting	Northing
			(National Geodetic Vertical Datum [NGVD] ft)				(Qualitative) erosion/ deposition ⁵			Length (ft)				
Tributaries														
8.05T	2008 CLRC-105	105	ND	ND	ND	ND	ND		Second River, above HOT ⁸ / potential source identification/ determine nature and extent	3	initial data	A	ND	ND
8.05T	2008 CLRC-106	106	ND	ND	ND	ND	ND		Second River, below HOT ⁸ / potential source identification/ determine nature and extent	3	initial data	A	ND	ND
8.05T	2008 CLRC-107	107	ND	ND	ND	ND	ND		Second River, below HOT ⁸ / potential source identification/ determine nature and extent	3	initial data	A	ND	ND
9.6	2008 CLRC-114	114	ND	ND	ND	ND	ND		Unnamed tributary below HOT (updated)	3	initial data	A	ND	ND
11.2T	2008 CLRC-108	108	ND	ND	ND	ND	ND		Third River, above HOT ⁸ / potential source identification/ determine nature and extent	3	initial data	A	ND	ND
11.2T	2008 CLRC-109	109	ND	ND	ND	ND	ND		Third River, below HOT ⁸ / potential source identification/ determine nature and extent	3	initial data	A	ND	ND
11.2T	2008 CLRC-110	110	ND	ND	ND	ND	ND		Third River, below HOT ⁸ / potential source identification/ determine nature and extent	3	initial data	A	ND	ND
15.5T	2008 CLRC-111	111	ND	ND	ND	ND	ND		Saddle River, above HOT ⁸ / potential source identification/ determine nature and extent	3	initial data	A	ND	ND
15.5T	2008 CLRC-112	112	ND	ND	ND	ND	ND		Saddle River, below HOT ⁸ / potential source identification/ determine nature and extent	3	initial data	A	ND	ND
15.5T	2008 CLRC-113	113	ND	ND	ND	ND	ND		Saddle River, below HOT ⁸ / potential source identification/ determine nature and extent	3	initial data	A	ND	ND

Table 1-1 Proposed Sampling Locations (Continued)
Presented without Modification from the LRC QAPP (ENSR 2008a, Table 1 of Appendix A)

Notes:

- CLRC – CPG Low Resolution Core
- ¹Water depths from CPG 2007 bathymetry surveys except where noted: ! = estimated from NOAA Chart 12337, * = MPI 2004 bathymetry survey (2.4 ft subtracted from mean low water (MLW) values to achieve National Geodetic Vertical Datum (NGVD))
- ²Geomorphic region approximated from MPI 2004 bathymetry. ND = No data
- ³Surficial sediment types as mapped by ASI Geophysical Survey, Spring 2005 (MPI CSM, Feb 2007); except where identified as "assumed," where sediment types were based on inference from bathymetry and location within river. ND = No data
- ⁴Geology and depth to refusal based on MPI Probing Survey (2007) and MPI coring results (geotechnical, high resolution, low resolution, and limited 2008 coring data), Tierra Solutions Inc. (1995 coring data) and morphologic setting for each location. Additionally, if core complete, then proposing sampling of recent sediments only.
- ⁵Erosion/deposition evaluated from MPI erosion/deposition analysis developed from several sets of bathymetry data (MPI 2007). ND = No data
- ⁶Analyses - Refer to complete list of analytes in Table 2
- A - Base analyte list for all samples in Table 2
 - B - Additional chemical and biological analyses in Table 2, including TVPH, methylmercury, hexavalent chromium, AVS/SEM, P, N, coliforms, and Giardia
 - C - Additional physical analyses in Table 2, including size-density classification, microscopy, petrography, PCB sediment-water partitioning. Samples will be identified by laboratory following laboratory screening of PCB concentration.
 - D - Fine-segmentation of 0-20/24 inch upper layer
- ⁷Dundee Lake locations will be finalized following confirmation of previous sample locations.
- ⁸Head-of-Tide (HOT) as specified by NJDEP (1986), locations may be adjusted in the field during the sampling effort.
- ⁹ Location requires field examination and possible relocation if subsurface utility lines are present.
- ¹⁰ All locations will be evaluated for physical characteristic data to combine with other measures of sediment stability for evaluation of sediment transport in the RI/FS.
- ¹¹The underlying sands and will be sampled and analyzed for PAHs, metals, cyanide, SVOCs, TPH Extractables, TOC, grain size, and VOCs. As agreed to with EPA, the analytes will be taken out of the primary core only, so all analytes may not be achievable in all samples.
- ¹² Target core length/ analyses are estimated only for the purpose of estimating the number of samples for Worksheet #20. The estimated target depth was determined by reviewing available core logs and MPI Probing data, which included depth to refusal. The cores will be collected to the red brown clay layer, sand or refusal.

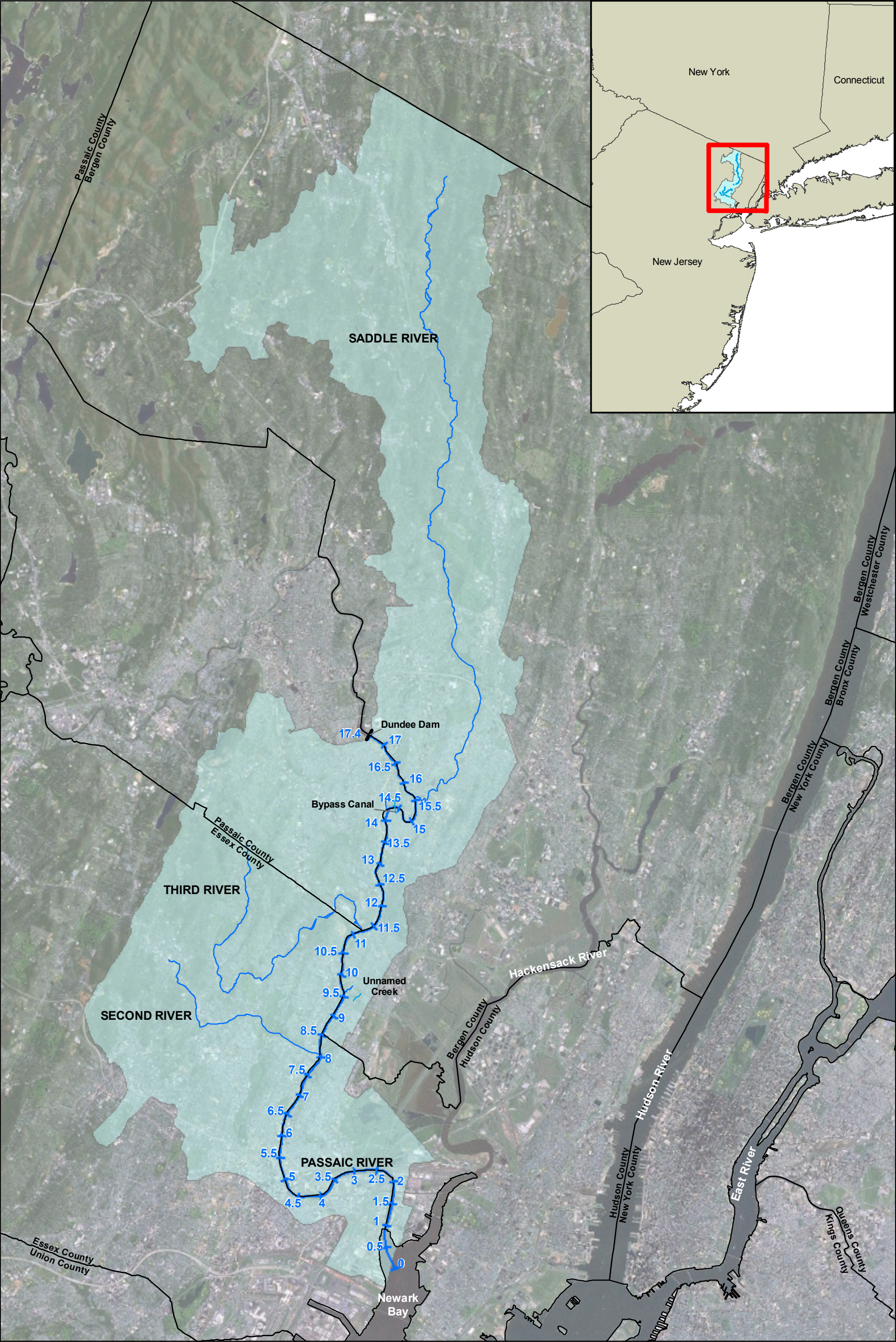
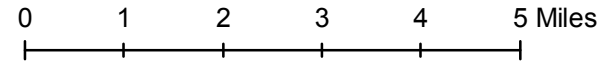






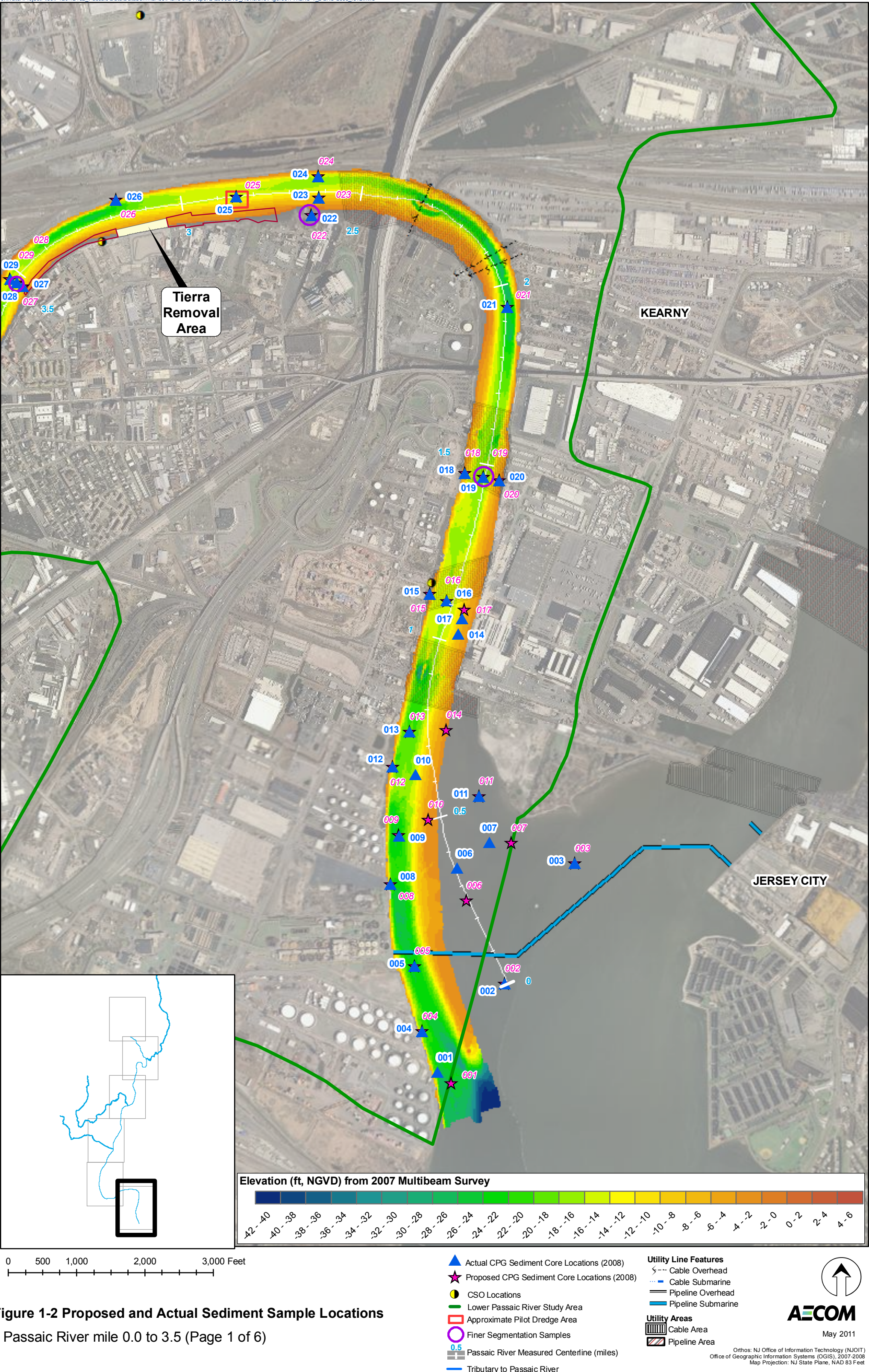
Figure 1-1 Lower Passaic River Study Area



-  Passaic River measured centerline (miles)
-  Passaic River Tributaries

-  Lower Passaic River Study Area
-  County Boundary
- World Imagery





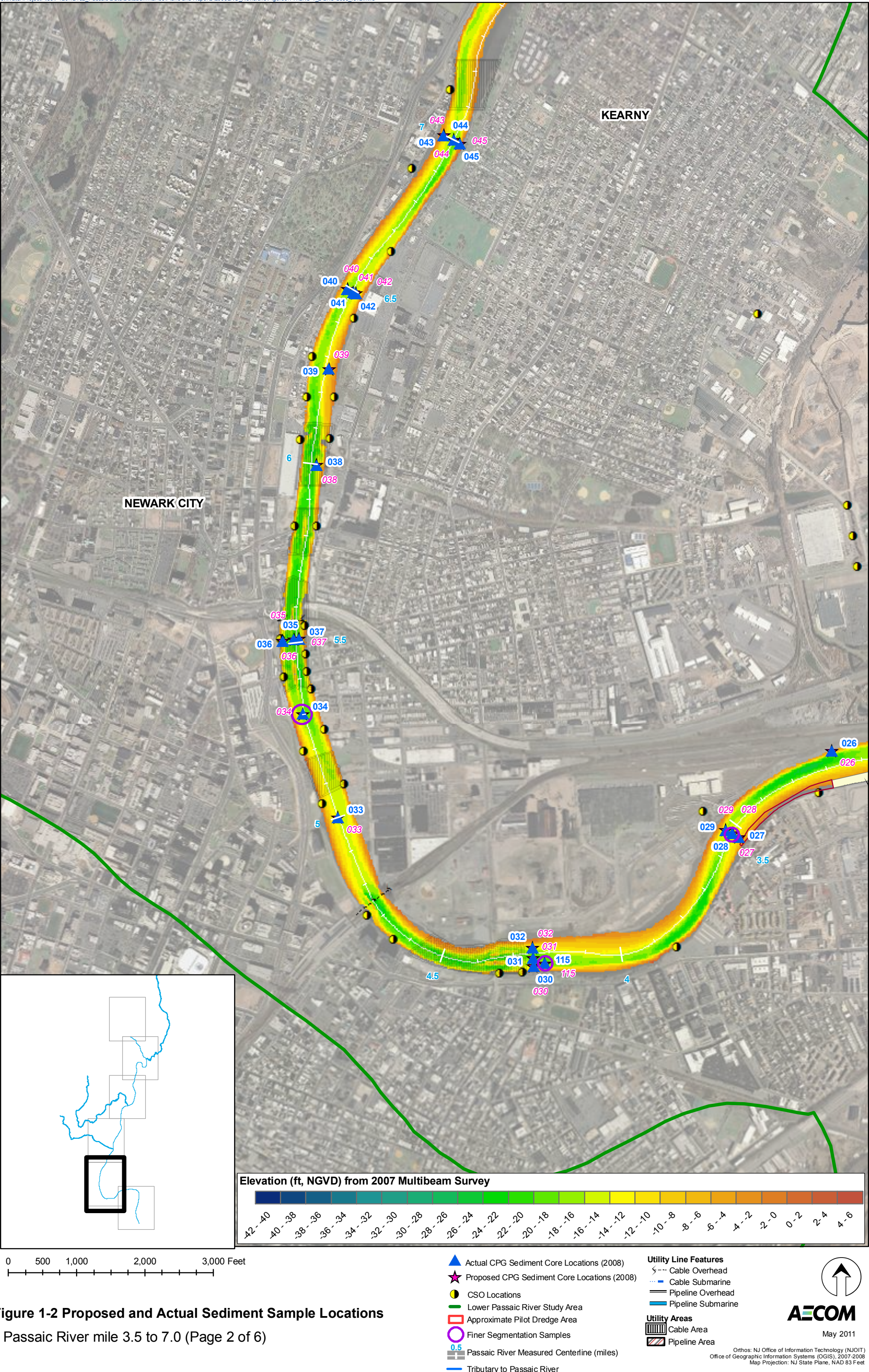
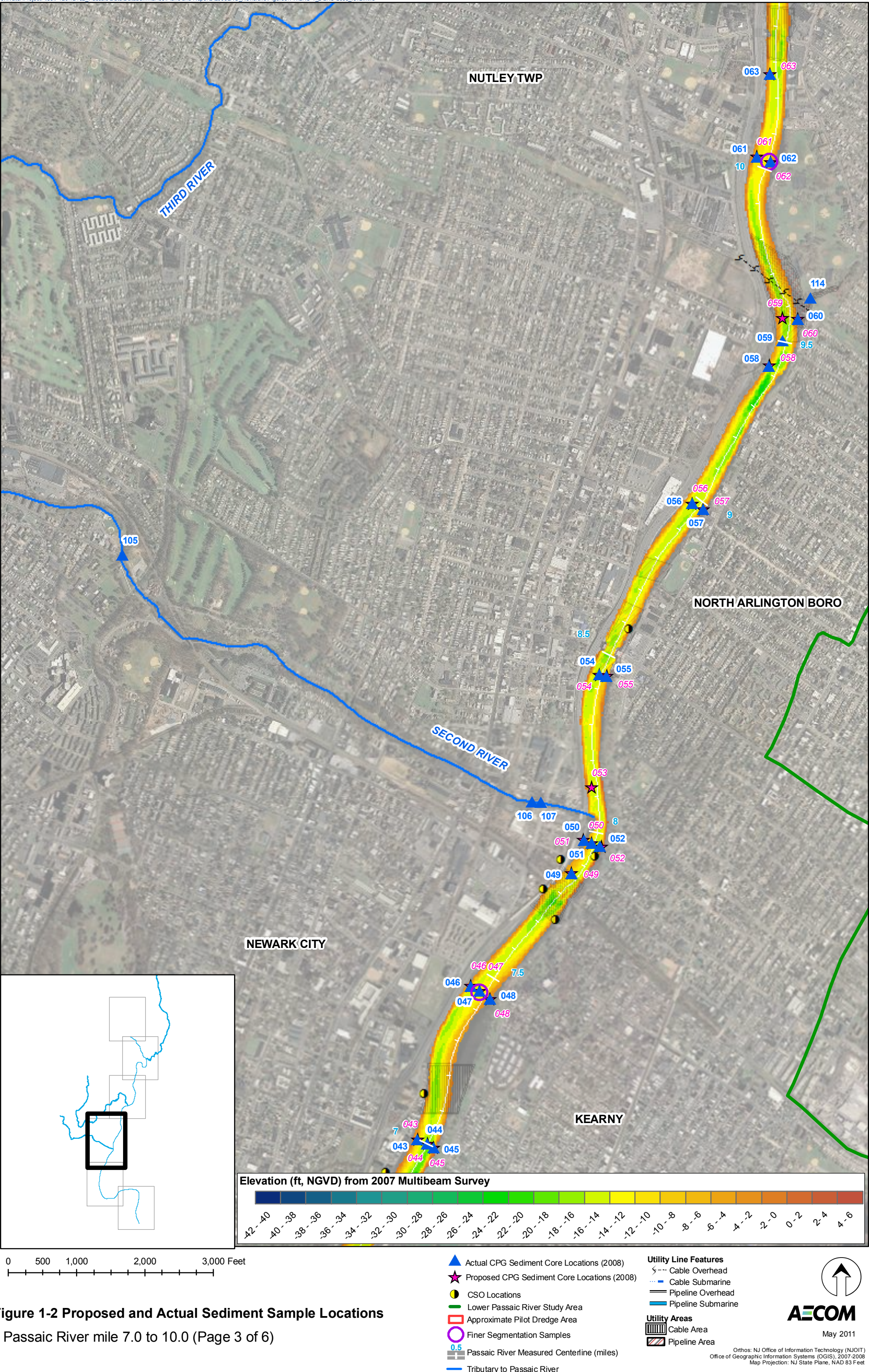


Figure 1-2 Proposed and Actual Sediment Sample Locations
Passaic River mile 3.5 to 7.0 (Page 2 of 6)



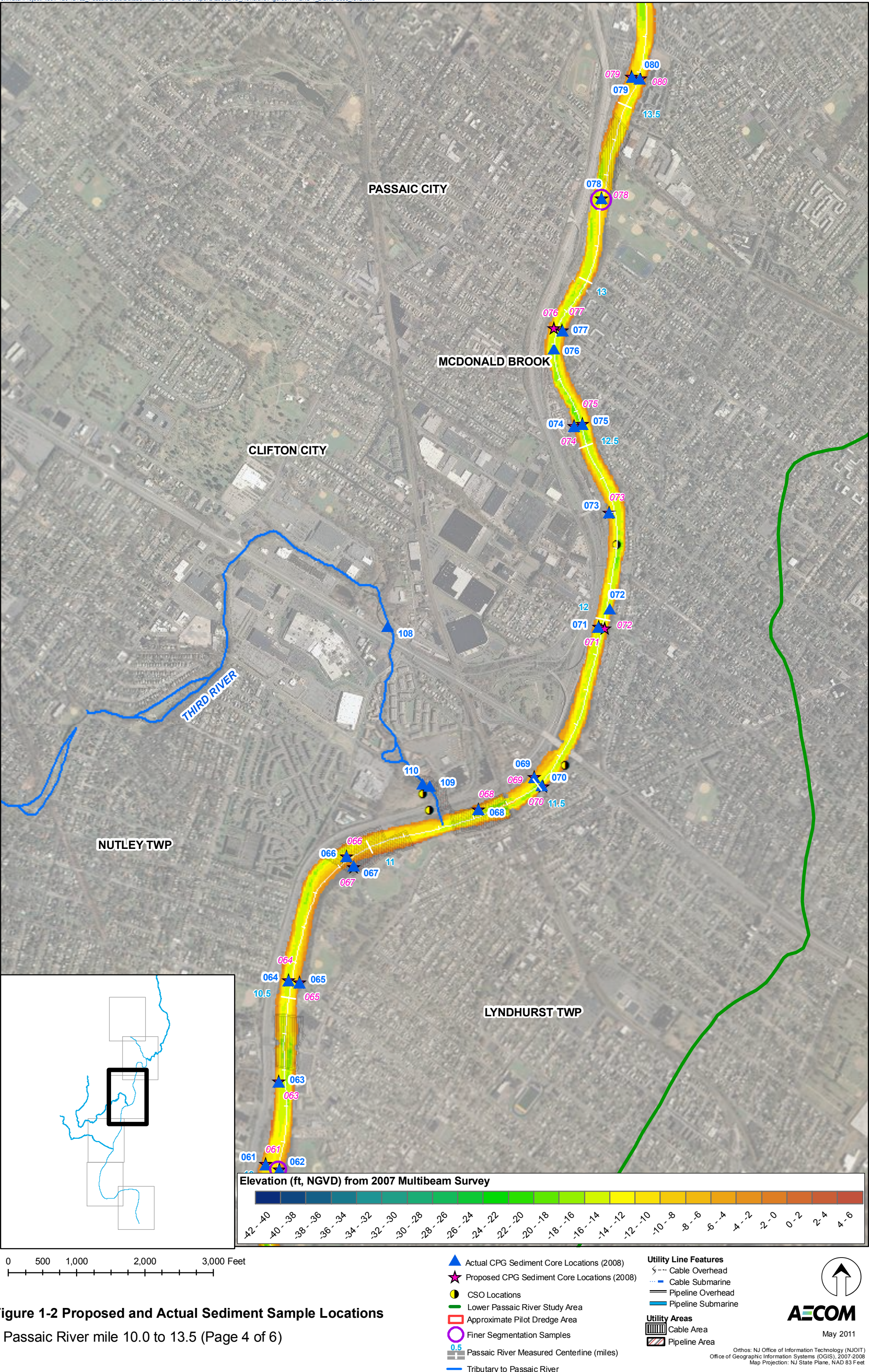
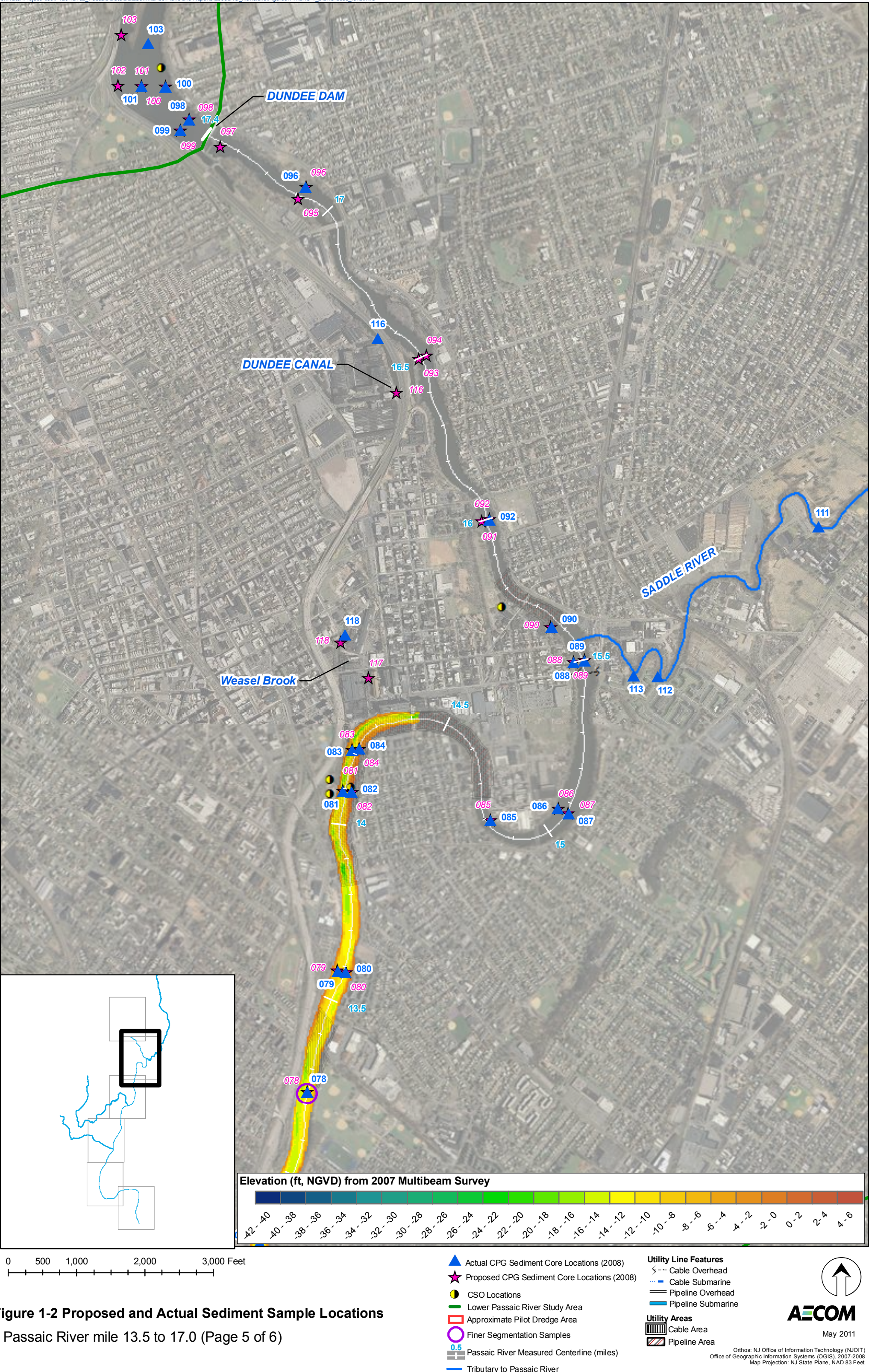


Figure 1-2 Proposed and Actual Sediment Sample Locations
Passaic River mile 10.0 to 13.5 (Page 4 of 6)



AECOM

May 2011

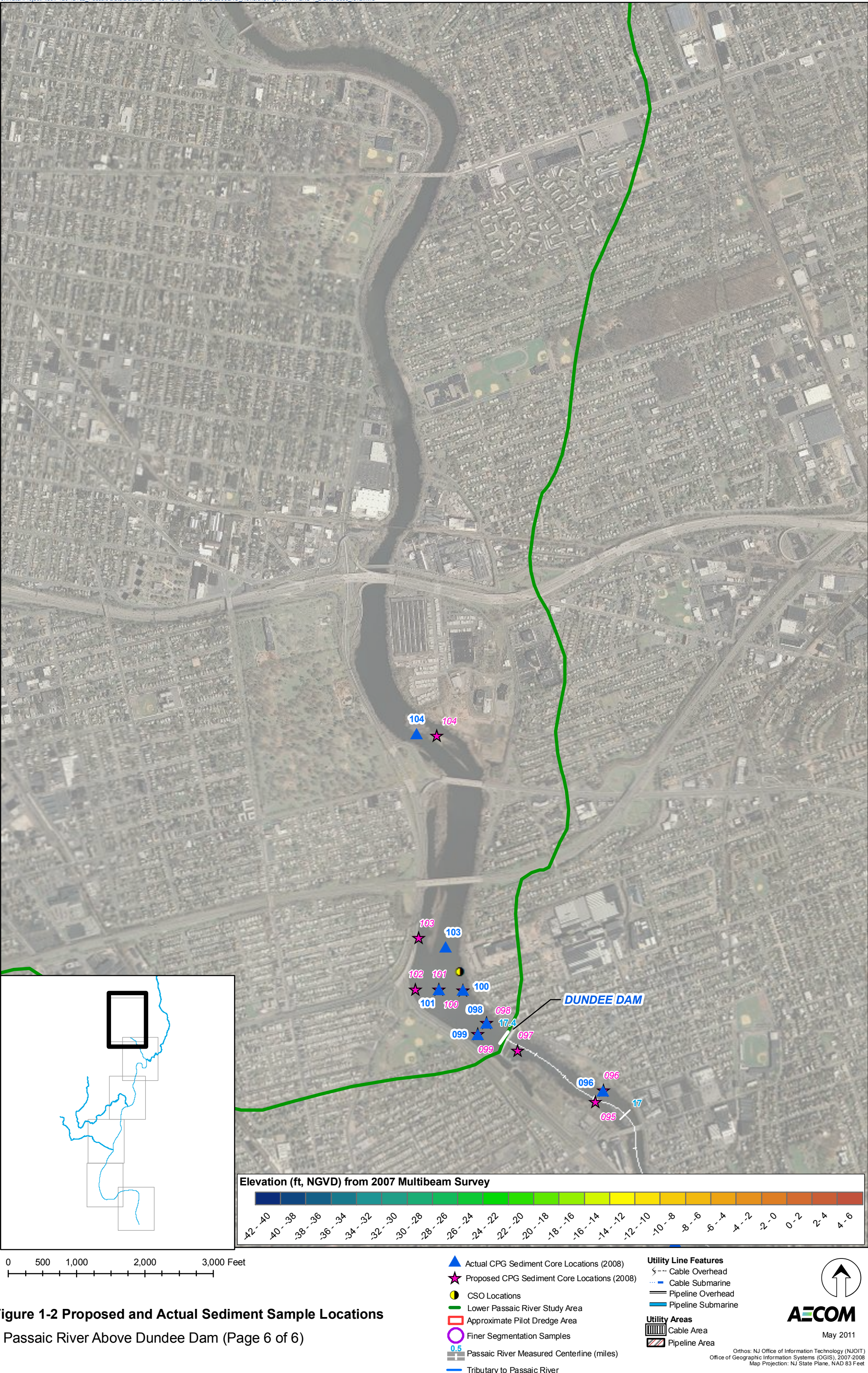




Figure 1-3 Proposed and Actual Sediment Sample Locations

Actual CPG Sediment Core Locations (2008)
Proposed CPG Sediment Core Locations (2008)
CPG Locations
Lower Passaic River Study Area
Approximate Flood Damage Area
River Segregation Sample
Passaic River Measured Centerline (miles)
Tributary to Passaic River

Utility Line Features
Cable Overhead
Cable Submarine
Highway Overhead
Highway Submarine
Pipeline Overhead
Pipeline Submarine
Cable Area
Pipeline Area

Elevation (ft. NGVD) from 2007 Multibeam Survey

0 1,000 2,000 4,000 6,000 Feet

North Arrow

Inset Map: Title 1, Title 2, Title 3

AECOM
June 2011
Credits: NJ Office of Information Technology (NJ.OIT)
Office of Geographic Information Systems (OGIS), 2007-2008
Map Projection: NJ State Plane, NAD 83 Feet

2.0 Field Implementation

This section provides a description of the field and laboratory activities performed during the LRC program. The program covered over 17 miles of river and was complex: multiple sample collection systems were mobilized and implemented, including vibracoring on two different size vessels, piston push coring, portable (backpack) vibracore and push core, and sediment surface (grab) sample collection. Samples were collected for 4 separate suites of laboratory analyses, and samples were prepared and shipped daily to 10 separate laboratory locations. Each aspect of the LRC program is described briefly in this section, with an emphasis on the identification and description of any variances from the approved procedures specified in the LRC QAPP, including the FSP Addendum (Appendix A of the QAPP) and associated SOPs (Appendix B of the QAPP) (ENSR 2008a). Anticipated modifications to field procedures that were necessary due to field conditions or equipment limitations were documented as field modifications (FMs) and submitted to USEPA for approval (**Table B-1**). Deviations from approved field procedures, generally due to unforeseen circumstances, were documented in the field records at the time of occurrence. Significant deviations that required a change in protocol were additionally recorded as nonconformance reports (NCRs) and submitted to USEPA. All deviations are summarized in **Appendix B (Table B-2)**. Copies of FMs and NCRs are included in **Appendix B**.

The LRC program was conducted from July 30 through December 16, 2008, with a break in the program from October 2 to October 20 due to the unavailability of the necessary coring equipment.

2.1 CPG Field Facility

The CPG field facility, located at the Kelways Industrial Park in East Rutherford, New Jersey (at RM 13.4), served as the operations base for the LRC program. MPI originally rented this facility and used it to support their field work for the LPRSA. MPI demobilized from the field facility when the CPG assumed responsibility for the completion of the RI/FS, at which point the CPG's Project Coordinator, de maximis, inc. (dmi), became custodian of the facility for the CPG.

The CPG field facility is equipped with a floating dock and a combination office/warehouse building with two truck loading bays. Indoor space at the facility was used for staging operations and processing of the core and grab samples before shipping to the analytical laboratories. All sample processing, equipment storage, and shipping were conducted from the field facility. The floating dock was used for vessel mobilization for stations located in the middle and upper sections of the study area. The lower portion of the study area was accessed from the Passaic Yacht Club located on the lower Hackensack River. The section above Dundee Dam was accessed from the Elmwood Park Fire Department Ramp, with the coring vessel launched and retrieved from the river using a crane. The portions of the tributaries and the Dundee Canal that could not be reached by boat were accessed by land.

2.2 Field Contractors and Subcontractors

AECOM Inc. (AECOM) (formerly ENSR) served as the primary contractor for the LRC field program, working under the direction of dmi. Sample collection and processing, sample management, data validation, and data management were performed by AECOM personnel. Subcontractors were used by AECOM for sediment coring and sampling support, surveying, data validation support (PCB congener data), and laboratory analyses, as described below. Additional marine services were provided by dmi, which operated and maintained a motorized Jon boat (19-foot SeaArk) that is owned by the CPG as part of the field facility. The CPG's boat was operated by qualified AECOM staff when dmi staff were not available. On-site QA/QC support also was provided by dmi.

2.2.1 Ocean Surveys, Inc.

Sediment sampling support was provided by Ocean Surveys, Inc. (OSI) of Old Saybrook, Connecticut. OSI provided vessels, vessel operators, and equipment for sediment coring and sampling within the main stem of the LPR and its tributaries, and for other coring areas that were inaccessible by main-stem coring boats. OSI provided the following primary services:

- Sediment vibracoring and surface sediment grab sampling using their vessels, the Research Vessel (R/V) *CanDu* and R/V *WillDu*. The *CanDu* was capable of coring to 30 feet below the sediment surface and was used primarily in the lower 14 miles of the river. The *WillDu* was a smaller vessel and was used in the upper portion of the river due to its shallow draft and ability to pass under the fixed-span bridges. The *WillDu* also was used in the Dundee Lake portion of the river.
- Vibracoring in areas not accessible by the *CanDu* or *WillDu* was conducted using a portable vibracore rig. The rig consisted of a handheld vibrating head attached directly to an aluminum core tube. A single Jon boat or a platform consisting of two Jon boats attached together was used to access tributaries.
- Sediment probing support.
- Tide gage installation support.

2.2.2 Gahagan and Bryant Associates, Inc.

Surveying tide gage locations was performed by Gahagan and Bryant Associates, Inc. (GBA) of Wilmington, Delaware. GBA performed this work in conjunction with conducting a single beam and multi-beam bathymetric survey of the river bottom for the CPG (conducted December 2009, near the end of the LRC sampling program). The bathymetric survey was conducted independent of the LRC program and will be reported in a separate submittal.

2.2.3 Laboratories

The analytical subcontractors to AECOM for the LRC program included 5 laboratories, at 11 locations (designated in the LRC QAPP [ENSR 2008a] as primary laboratories):

- Analytical Services, Inc. in Williston, Vermont;
- Columbia Analytical Services, Inc. in Kelso, Washington; Houston, Texas; and Rochester, New York;
- Brooks Rand, LLC in Seattle, Washington;
- GEL Laboratories, LLC in Charleston, South Carolina; and
- TestAmerica Laboratories, Inc. in Knoxville, Tennessee; West Sacramento, California; South Burlington, Vermont; Pittsburgh, Pennsylvania; and Edison, New Jersey.

The primary laboratory identified in the LRC QAPP for each analysis was utilized with the following exceptions:

- VOCs and pesticides by gas chromatography/electron capture detector (GC/ECD) – Prior to the start of sampling, the VOC and pesticides by GC/ECD analyses were moved from TestAmerica-Knoxville to Columbia Analytical Services-Kelso. This decision was based on the Performance Evaluation (PE) sample results and concern over specific matrix issues. A discussion of the PE sample results is provided in **Appendix M**.

- Total petroleum hydrocarbon (TPH)-extractables – In early September 2008, the TPH extractables analyses were transferred from TestAmerica-Edison to TestAmerica-South Burlington. This decision was based primarily on the PE sample results. A further discussion of this issue is included in Section 2.10.6 regarding modifications to sample analyses for TPH-extractables.
- Grain size (for finer segmentation cores) – Laser diffraction, the high resolution method of grain-size analysis, was requested by MPI for the finer segmentation samples (referred to as D locations). This method was not offered by the primary grain-size laboratory (Columbia Analytical Services-Kelso); this analysis was subsequently placed with TestAmerica-South Burlington.
- Samples for the PCB partitioning studies were analyzed by TestAmerica-Knoxville (PCB congeners) and TestAmerica-South Burlington (total organic carbon [TOC] and dissolved organic carbon). Specialty analyses were conducted by two additional laboratories:
 - University of Maryland, in Ellicott City, Maryland; and
 - Koppers in Pittsburgh, Pennsylvania.

The laboratories and the analyses performed by each laboratory are shown in **Table 2-1**.

2.2.4 Data Validation

Phoenix Chemistry Services (Phoenix) of North Ferrisburg, Vermont, under contract to AECOM, provided data validation services. Phoenix performed the majority of the validation of the PCB congener data, with support from AECOM. AECOM performed the validation for the remaining analyses.

2.3 Health and Safety

All work performed during the LRC program was conducted under the terms of the project Health and Safety Plan (HASP) prepared by MPI (2005d). In order to address specific needs of the LRC program, AECOM prepared a HASP Addendum (ENSR 2008b) to address conditions and work practices not covered by the MPI HASP and to include AECOM-specific health and safety requirements. The HASP Addendum and the MPI HASP were distributed to all on-site workers for review and signed acknowledgement. Copies of the MPI HASP and the HASP Addendum were maintained at the CPG field facility; additional copies of the HASP Addendum were located on the sampling vessel(s).

The safety goal for this project was zero incidents and zero accidents², with work tasks designed to minimize or eliminate hazards to personnel, equipment, the environment, and the general public. The goal was achieved: zero incidents and zero accidents occurred during field implementation.

2.3.1 Training and Meetings

All AECOM, dmi, and subcontractor field staff held current Occupational Safety and Health Administration 40-hour hazardous waste worker certification and were certified and fit-tested for respirator use. Hepatitis immunizations were provided for staff working in the field or processing sediments. AECOM and subcontractor field staff also were trained in cardiopulmonary resuscitation, first aid, defensive driving, and man overboard and abandon ship procedures, as pertinent to their assigned tasks.

² Zero incidents and zero accidents is the corporate goal for AECOM and is defined in Corporate Safety Health and Environment SOP 201. The reference to zero incidents includes injuries, illness, and property damage and zero accidents involving employees, property, and environmental impairment.

Safety briefings were conducted daily by the Site Safety Officer (SSO) or appointed designee before initiating work activities both on the boat and in the CPG field facility. An additional safety meeting was conducted at the end of the week to discuss near misses and to identify the evolution of potential hazards. Job safety analyses (JSAs), outlining the hazards for each step of a work task, also were prepared and discussed in detail so staff understood the critical actions and the stop-work criteria.

Site visitors and new staff were given a 30-minute safety briefing by the SSO that included a review of site environmental health and safety (EHS) procedures and required that a signed acknowledgement of the MPI HASP and HASP Addendum be submitted. A site tour was conducted to ensure familiarity with known and posted hazards.

2.3.2 Air Monitoring

Processing of the sediment cores was performed in an enclosed tent structure located within the CPG field facility. This temporary structure was equipped with exhaust ventilation to prevent accumulation and release of potential hazardous vapors from the processing area. As a precautionary measure, air monitoring was performed continuously in the sediment processing area for the presence of total VOCs, mercury, and hydrogen sulfide (H₂S) vapors in accordance with Chapter 6.0 of the HASP Addendum (ENSR 2008b). Air monitoring instruments (photoionization detector, MiniRae Multi-gas meter, and Jerome 431-X) were calibrated at the beginning of the day and additionally if readings were suspect; calibration logs for these instruments are maintained in the project file. Instrument readings were recorded on an Air Monitoring Log approximately every 1 to 2 hours. Ambient air monitoring also was performed in other areas of the CPG field facility including the equipment decontamination area, investigation-derived waste (IDW) storage area, and shipping area. After review of initial readings inside the processing area during the first 5 weeks of processing, periodic air monitoring outside the processing area was terminated, with the exception of the decontamination area when equipment decontamination was being performed. Air monitoring continued inside the processing area for the duration of core processing efforts and during liquid IDW transfers. Air Monitoring Logs are maintained in the project files and the results are summarized in **Table C-1 of Appendix C**.

Results of ambient air monitoring performed during sediment processing indicate that constituent action limits, as specified in the HASP Addendum (ENSR 2008b) were exceeded on only three occasions. During the first occasion (July 30, 2008), total VOC readings spiked to 5.6 parts per million at the decontamination station while a worker was rinsing solvents from equipment with deionized (DI) water over the sink. A fan adjacent to the decontamination station was turned on and bay doors at the loading dock opened to circulate fresh air in the area.

On July 31, 2008, total VOC readings exceeded the action limit when collecting a PCDD/PCDF equipment rinse blank using hexane. Future PCDD/PCDF equipment rinse blanks performed within the CPG field facility were collected under the ventilated hood.

On August 11, 2008, mercury vapor readings were detected above action levels in the headspace of sediment sample 2008-CLRC-058 in a homogenization mixing bowl. The bowl was covered with foil, placed in front of the exhaust vent, and air readings were taken throughout the tent. Action levels in other areas of the processing enclosure were not exceeded. Processors in the tent donned half-mask air filtration respirators to complete the processing of this sample. When the sample was transferred to the cooler, it was placed in a Ziploc[®] bag, and the shipping team and laboratory were notified of the elevated reading. As a precaution, if subsequent sediment samples emitted vapors during collection or homogenization at or exceeding action levels, the sample was either placed immediately adjacent to an exhaust vent for processing, or the processor donned a respirator and the sample was taken to the ventilation hood for processing. Results for core location 2008-CLRC-058 indicate the mercury concentration of 5.04 milligrams per kilogram (mg/kg) at the 5.5- to 7.5-foot depth was just above the mean of all samples in the LRC program of 3.82 mg/kg.

2.3.3 Inspections and Audits

Inspections of safety equipment located at the CPG field facility, including fire extinguishers, first aid kits, and eye wash stations, were performed approximately once per month. Inspection forms are maintained in the project file.

An EHS on-site field audit was conducted on August 13, 2008, by AECOM's Regional Health and Safety Manager. The audit included review and direct observation of boat-based sediment sampling, sediment processing activities, general warehouse operations, and equipment decontamination activities. Minor modifications to these procedures were recommended and were implemented the same day.

2.3.4 EHS Near Misses and Job Safety Analyses

AECOM's EHS program includes recording near misses as a tool to avoid incidents and accidents. Near misses recorded during the previous week's work activities were reviewed at the end of each week. In addition, JSAs were completed for new tasks or different investigative techniques that were not addressed in the HASP Addendum if new hazards were associated with the proposed changes. An effective control measure was identified for each new hazard and subsequently reviewed with site workers during the daily safety meeting. Near misses and JSAs are maintained in the project file.

2.4 Sampling Program Design

The LRC program design, including selection of station locations, target depths, and suites of analytical parameters, is included in the LRC QAPP (ENSR 2008a). A summary of the design, including any changes from the proposed program presented in the LRC QAPP (ENSR 2008a), is presented below.

2.4.1 Station Location Selection Process

The LRC program originally encompassed the collection of sediment cores and grab samples at 115 proposed locations. The locations were placed along transects and at strategic locations along the full length of the LPR, upstream of the Dundee Dam, and at stations above and below the head-of-tide (the point at which the tributary is no longer affected by the tide) on the Second River, Third River, Saddle River, and an unnamed tributary. Sampling locations were chosen to provide site-wide coverage for assessment of the nature and extent of impacts, to assess potential source areas, and to gather data on physical characteristics of the sediment to further the understanding of sediment stability over the study area. Specific considerations for the selection of each location were provided in the LRC QAPP (ENSR 2008a) and are reproduced in **Table 1-1**.

Three additional tributary stations were added to the coring program to characterize potential impacts along the former Dundee Canal (2008-CLRC-116 and -117 at the former Dundee Canal and 2008-CLRC-118 in Weasel Brook). These locations were proposed as a FM (refer to FM-081206Rev1 in **Appendix B**), and approved by USEPA on December 15, 2008, bringing the total number of target locations to 118. Proposed and actual station locations are provided in **Table 2-2** and shown by RM on **Figure 1-2**. Sample locations were based on the following considerations as described in the LRC QAPP (ENSR 2008a):

- Transect spacing of 0.25 mile in RM 0 to RM1 where previous sediment coring had not been conducted.
- Transect spacing of 1 mile from RM 1.5 to RM 6.5, with the goals of:
 - Updating the Passaic River Study Area (PRSA) sediment data that were obtained in 1995.
 - Providing additional characterization of cores that are considered "incomplete" (i.e., cores with elevated concentrations in the deepest interval analyzed). It is important to note that the goals for the 1995 PRSA and the 2008 RI/FS studies differ significantly. The goal for

sampling the PRSA (i.e., RM 1 to RM 7) was to define the 1940 horizon. The RI/FS goal is to characterize sediment to the red-brown clay/silt, sand, or to refusal. Where PRSA cores were “complete” (i.e., low concentrations were detected at depth), the samples collected in the LRC program consist of sediment from the 2008 sediment-water interface to the depth of the sediment-water interface sampled in 1995 (approximated to be no more than 5 feet [ENSR 2008a]). These depth intervals included a 0- to 6-inch Biologically Active Zone (BAZ) sample. These samples were collected in the same manner as the standard LRC program.

- Completing RI/FS requirements for determining the nature and extent of contamination.
- General coverage with approximate transect spacing of 0.5 mile or more above RM 7.
- Geomorphic region (channel, mudflat, river bend, etc.).
- Previously characterized sediment type.
- Previously characterized erosional or depositional areas.
- Proximity to previous sampling locations.
- Proximity to potential contamination sources.

Additionally, representative samples from above the Dundee Dam and tributary samples were obtained to characterize potential up-river sources to the LPRSA. A field reconnaissance was performed for each tributary prior to sampling in order to select appropriate coring locations. During the reconnaissance, water and sediment conditions were observed, access and ability to collect samples was assessed, and preliminary probing was completed to determine whether grab or core samples could be collected. Two locations below the head-of-tide within each tributary, and one above, were identified. The tributary locations were submitted to USEPA for approval prior to sampling (see documentation in **Appendix B**, which also provides the approximate locations), and were approved by USEPA on September 4, 2008.

During planning, transect locations were adjusted: 1) to avoid interference from bridges or other structures; 2) to be better placed relative to features of interest, such as tributaries and CSOs; and 3) to position core locations such that fine-grained sediments were likely to be present.

Additional cores were located throughout the 17.4-mile LPRSA to:

- Supplement the 0.50-mile transects with additional sampling locations related to features of interest;
- Fill in between 0.50-mile transects when the transects were adjusted to be more than 0.50 mile apart due to the factors listed above; and
- Obtain cores at locations where previous sediment sampling has been performed to provide additional comparative data.

On transects in the wider sections of the river from RM 0 to RM 8, three cores were collected to capture the main channel and each side of the channel or tidal flat areas. In areas where the river narrows and shoals upstream, two cores per transect were collected. For each two-core transect, one core was positioned for the greatest probability of capturing fine-grained sediments (typically on a shoal area flanking the channel). The second core was positioned on the opposite side of the channel or shoal area, or on the far side of the channel itself if the channel was positioned against the opposite river bank.

A subset of the core locations between RM 0 and RM 1 was relocated at the request of the USEPA, in order to assess locations that the NJDEP had identified as historical discrete deposition areas. Cores 2008-CLRC-001, -006, -007, -012, and -014 were repositioned following review and discussion with the USEPA. Considerations included the need to target each of the depositional areas and to maintain representative coverage in the RM 0 through RM 1 area, while allowing for impediments such as boat

access (water depth) and possible presence of utilities or immediately adjacent shoreline infrastructure (such as private docks). The final locations for the cores in RM 0 through RM 1 were approved by the USEPA on November 17, 2008.

Subsets of the 118 locations were proposed for analyses in addition to the baseline analyses (Group A analytes, see discussion in Section 2.5.1). Group B analytes (see Section 2.5.1) were proposed for 13 locations in order to determine the relevance of these analytes for future phases of the investigation. These sample locations were selected after a review of previous sampling to ensure coverage over the full length of the river, with a focus on areas of finer-grained sediments and including a review of station details, such as depth and expected sediment type. Stations selected for Group B analysis were 2008-CLRC-001, -007, -021, -026, -034, -040, -045, -055, -067, -073, -082, -088, and -100.

Group C analytes were proposed for a subset of locations to be analyzed for a PCB partitioning study evaluation. Samples were collected from the 118 proposed locations, where feasible, and a subset of 6 samples was selected following laboratory analysis of PCBs. The locations selected were 2008-CLRC-011 -015, -044, -073, -079, and -098. Note that the response to USEPA comments on the LRC QAPP dated June 27, 2008, identified location 2008-CLRC-007 as one of the six planned for analysis based on USEPA's request that a sample in the mudflats near Kearny Point be included for this analysis. During the field investigations some locations in RM 0 through RM 1 were relocated following review of recently collected USEPA data along with mapped areas of historical deposition areas as discussed above. 2008-CLRC-007 was one of these locations and was moved further offshore; therefore 2008-CLRC-011 was selected for the PCB partitioning study in place of 2008-CLRC-007.

In addition, a subset of eight proposed stations, designated as Group D, was selected for collection of additional cores for analysis of finely segmented sediments. Data from finer segmentation or "core top" samples were collected to supplement chemical fate and transport modeling and risk assessment data. These stations also were selected to ensure coverage along the LPR and included 2008-CLRC-019, -022, -028, -034, -047, -062, -078, and -115.

2.4.2 Target Depths and Sample Intervals

Target coring depths for each station were developed based on a review of available geotechnical boring, sediment core, and probe data from the LPRSA and Newark Bay and are shown in **Table 1-1**. Target depths were selected to fully characterize the thickness of sediment from the sediment-water interface down to native material (red-brown sand or clay/silt). Low resolution cores were therefore advanced at each station until native material was encountered or to core refusal. Samples were collected for the following intervals specified in the LRC QAPP (ENSR 2008a):

<u>Interval</u>	<u>Core Depth</u>	<u>Sample Scheme</u>
A interval	0 to 0.5 feet	(sampled in conjunction with surface grab sampling)
B interval	0.5 to 1.5 feet	1-foot interval
C interval	1.5 to 2.5 feet	1-foot interval
D interval	2.5 to 3.5 feet	1-foot interval
E interval	3.5 to 5.5 feet	2-foot interval
F, etc.:	5.5+	2-foot intervals continuing to native material or refusal.

Where sand was encountered as a layer that completely under the upper, fine-grained sediments (rather than as a shallow sand lens within the core), it was sampled for a subset of analytes (Section 2.5.1) to determine vertical extent of contamination. Previous sampling by USEPA indicated that contaminants were not present in the native clay material (MPI 2007b).

In addition, to address a requirement of FSP1 Task 5.3 (MPI 2006), an additional core was collected at a subset of the 8 stations and sampled in finer intervals in the top 2 feet for Group D analyses. These samples were taken in addition to the core and grab samples collected for Group A, B, and C analysis. A box core was proposed for collection of these samples, however a 6-inch piston corer was utilized when the box coring device was not available in the size and depth needed (see Section 2.7.3 for further details). The finer segmentation sediment samples were split into five intervals, per USEPA requirements (MPI 2008) as follows:

<u>Core Depth</u>	<u>Sample Scheme</u>
• 0 to 2 cm	(0 to 0.07 feet)
• 2 to 5 cm	(0.07 to 0.16 feet)
• 5 to 10 cm	(0.16 to 0.33 feet)
• 10 to 30 cm	(0.33 to 0.98 feet)
• 30 to 60 cm	(0.98 to 1.97 feet)

Sampling intervals were measured at the CPG field facility based on actual lengths observed. Sampling intervals were adjusted at limited locations where voids were noted in the cores.

2.5 Analytical Program Design and Hierarchy

2.5.1 Analytical Suites

The analyses performed on the sediment samples collected for the LRC program were grouped into four categories (Groups A through D). These categories are described below. The specific constituents reported for each analysis were consistent with those identified in the LRC QAPP (ENSR 2008a).

Group A. An extensive list of chemical, radiochemical, and physical analyses was performed on all core samples from each station (except as noted below). In order of priority, Group A analytes included:

- Radionuclides (Beryllium-7 [Be-7], Cesium-137 [Cs-137], Lead-210 [Pb-210], and Potassium-40 [K-40]). Be-7 was collected at the surface interval only;
- PCDDs/PCDFs;
- PCB congeners;
- PAHs by high resolution gas chromatography/low resolution mass spectroscopy – selective ion monitoring (HRGC/LRMS-SIM);
- PCB Aroclors;
- Pesticides by high resolution gas chromatography/high resolution mass spectrometry (HRGC/HRMS);
- Pesticides by GC/ECD. Note, this analysis was not conducted for the surficial sample (per discussion with USEPA and as documented in the response to the LRC QAPP comments [June 27, 2008 #31] due to sample mass limitations) and the analysis of samples by this method was limited to a subset of approximately 30 samples per week because of laboratory capacity limitation (ENSR 2008a);
- Mercury;
- VOCs;
- Semivolatile organic compounds (SVOCs);

- Metals;
- Butyltins;
- Cyanide (CN);
- TOC;
- Herbicides;
- TPH-extractables;
- Grain size;
- Specific gravity;
- Atterberg limits; and
- Total sulfide (surface interval only).

If red-brown sand was encountered at the bottom of the primary core, analyses from that interval were limited to VOCs, PAHs by HRGC/LRMS-SIM, metals, CN, mercury, SVOCs, TPH-extractables, TOC, and grain size.

Group B. Additional organic, nutrient, and bioavailability analyses were performed at a subset of stations (see Section 2.4.1) to determine their relevance for future phases of the investigation. The Group B analytes were collected in the surficial sample interval and included:

- TPH-purgeables;
- Hexavalent chromium (Cr(VI));
- Methyl mercury;
- Acid volatile sulfide/simultaneously extracted metals (AVS/SEM);
- Total phosphorus;
- Ammonia; and
- Total Kjeldahl nitrogen (TKN).

Group C. Additional particle size-density classification, microscopy, petrography, and PCB sediment-water partitioning (Equilibrium Partitioning [EqP]) analyses were performed on surficial sediment samples from six stations to evaluate these analytical techniques for potential use in future phases of the investigation. The six locations were selected based on physical characteristics of the sediment and the results of laboratory screening-level PCB analyses conducted before performing HRGC/HRMS quantification of PCB congeners.

Group D. Finer segmentation of samples from 0 to 2 feet below the sediment surface, as requested by USEPA's contractor, HydroQual Inc., was performed to better define the characteristics of the sediment bed for the development of the chemical fate and transport model. The stations selected for these analyses are defined in Section 2.4.1. Due to the limited volume of sediment produced by the finer segmentation process, the D station samples were submitted for the following subset of analyses listed in order of priority:

- Grain size;
- Bulk density;
- PCDDs/PCDFs;
- PCB congeners;
- PAHs by HRGC/LRMS-SIM;
- Pesticides by HRGC/HRMS ;
- Mercury;
- TOC;
- SVOCs;
- Metals;
- CN; and
- Herbicides.

The analytical group assigned for each station is shown in **Table 2-3**.

2.5.2 Prioritization

Analytical hierarchies were established based on a number of factors, including sample volume, method of collection, nature of the analytes (e.g., volatility), and USEPA input.

Surface samples collected via grab sampler at each station were collected to obtain undisturbed surface sediment for Be-7 and VOC analysis instead of via vibracoring where there was potential to disturb the sediment surface during sediment retrieval. To compare lateral heterogeneity between the grab and core locations, samples for copper and nickel (Cu/Ni) were collected where sufficient samples/volume was obtained. In addition, samples for sulfide and potential EqP analysis also were collected from each grab sample location. At each of the proposed Group B locations, an additional grab sample was collected for the Group B analytes. The analytical priority for grab samples was consistent with Table 3 (Group A) and Table 4 (Group B) of the LRC QAPP (ENSR 2008a, Appendix A).

For each interval processed from the core, samples for Group A, analytes were collected in order of priority starting with the primary core (the core, which first achieved acceptability criteria [see Section 2.7.1.2]). In general, the 0.5-foot and 1-foot intervals required collection and processing of a secondary core to obtain enough sample volume to complete the analysis of Group A analytes. (Note that the expected sediment moisture content and required weights of material needed for the various analyses were estimated before the start of the LRC program using materials from trial cores from representative reaches of the river.) Once the sediment from the primary core was depleted, samples were collected from the secondary core in continuing order of priority. Additional sample cores also were generally required to obtain sufficient volume for samples that were split with MPI for analysis at a USEPA selected laboratory (Section 2.11.4.2). When red-brown sand was encountered as native material, samples were collected and analyzed for a subset of analytes (presented in Section 2.5.1) in order of priority based on available volume. The sample priority for Group A analytes is consistent with Table 3 of the LRC QAPP (ENSR 2008a, Appendix A). The hierarchy of analytes was determined in conjunction with USEPA during development of the LRC QAPP. USEPA's priority was to obtain PCDD/PCDFs, PCB congeners, PAHs by HRGC/LRMS-SIM, PCB Aroclors, pesticides by HRGC/HRMS, and mercury from the primary core; pesticides by GC/ECD also were included for comparison purposes. At limited locations, insufficient sediment volume at select intervals did not allow for collection of all Group A analytes. In these instances, analyses not performed on specific intervals

are noted in **Table 2-4**. Table 4 of Appendix A of the LRC QAPP (ENSR 2008a) provides the sample prioritization for those locations where Group B analytes also were analyzed.

The finer segmentation (Group D) samples were submitted for the list of analytes noted in Section 2.5.1. The sampling priority for these intervals is as listed and shown in Table 1 of FM 081103-1 approved by USEPA on November 28, 2008 (**Appendix B**).

Sample stations, intervals, and analyses submitted for each sediment sample are shown in **Table D-1** in **Appendix D**. **Table D-2** presents the same information for the field quality control (QC) samples.

2.6 General Field Activities

2.6.1 Site Control

The CPG field facility was kept locked in order to maintain security and custody of the sediment samples being stored and processed inside. A site log-in/log-out form was maintained to ensure that personnel either on-site at the CPG field facility or on vessels were accounted for. Visitors to the site were required to sign the log-in/log-out form and were accompanied through the facility by AECOM or dmi staff.

2.6.2 Staff Training

Before performing any of the field tasks, field staff were required to be familiar with the SOPs that applied to their specific tasks and to demonstrate proficiency in each of those tasks under the supervision of a qualified staff member. Training was conducted for the initial project staff during mobilization at the start of the LRC program, and with new staff members as they joined the LRC program. The training/certification records for each person are maintained in the project files.

2.6.3 Permitting and Notifications

2.6.3.1 Coast Guard Vessel Traffic and Homeland Security Notification and Coordination

United States Coast Guard (USCG) notification is required for projects located within any chartered or Federal Channel, or for any side-scan, towed sonar, or other surveys conducted as per the Inland Navigation Rules, within the Vessel Traffic Safety Area of Responsibility. Authorization to perform work is granted under the Ports and Waterways Safety Act [(33 United States Code 1225(a)(2)(C))]. Notification for the LRC sampling program included information on administrative point-of-contact, location of operations, duration of work days, vessel positioning, and vessel specifications.

The USCG Sector New York was given written notice of the planned scope, schedule, and vessel information for sediment sampling in Newark Bay and the LPR on July 2, 2008. Authorization was given to proceed with the work outlined in the written notification, starting July 7, 2008, and terminating October 30, 2008. The following conditions were imposed:

- The USCG must be notified immediately about any changes in the schedule; and
- The USCG Vessel Traffic Center (VTC) must be notified 15 minutes before arriving at each sampling location and upon completion of each sampling operation south of the Point-No-Point swing bridge at RM 2.3.

Updated schedules were provided to the USCG VTC periodically throughout the life of the project. On October 17, 2008, e-mail notification was given to USCG Sector New York as to the extension of the project schedule through mid-December. The extension to perform work outlined in the original notification letter was authorized by the USCG on October 24, 2008. In addition, the VTC was notified either by phone or by marine radio each day prior to operation in the lower 3 miles of the river.

2.6.3.2 Additional Homeland Security Notifications

For each municipality located along the Passaic River, local Homeland Security officers were identified and contacted. Written Homeland Security notifications were mailed, faxed, or e-mailed to corresponding municipal and state police Homeland Security designees informing each that environmental surveying was anticipated within the river. The tentative sampling schedules and vessel information were provided with the notifications.

2.6.3.3 Bridge Notifications

A total of 24 bridges are located within the LRC project area (**Table 2-5**). These bridges include 1 open dismantled railroad bridge located at RM 0.89, 7 swing bridges, 4 lift deck bridges, and 12 fixed structures. During implementation of the LRC program, coordination between several of the swing and lift deck bridges was necessary to ensure safe passage of sampling vessels based on tide, water elevation, and vertical clearance. In addition, permission was required for the installation of tide gages on a number of these structures (see Section 2.6.6).

AECOM identified and confirmed contact/ownership information for each bridge located within the project area. Opening notifications were confirmed and bridge crews were contacted as specified by the contact. For bridges under NJDOT control, a request ticket was issued through a dispatcher 24 hours in advance. The majority of the other opening requests were submitted either the day before, or 24 hours prior to, vessel movement and reconfirmed the day of passage. To avoid unnecessary mobilization of bridge crews, AECOM confirmed tide stage, tide elevation, work duration, and the vertical clearance for each coring vessel with the OSI vessel captain on a continuous basis. Bridge crews were notified of opening cancellations by cell phone and from the vessel on very high frequency radio.

Electronic or hardcopy approval was received prior to tide gage attachment on bridges. In addition, for structures located below RM 3.0 that would be used for tide gage installation, the USCG was notified in advance of the planned work.

2.6.4 Utility Clearance

Where possible, coring locations were selected to avoid known utility crossings within the LPR. However, some mapped utility crossing areas were large enough that it was necessary to plan cores within their boundaries in order to provide adequate study area coverage. It was not assumed that the mapped crossing information was accurate, complete, or up-to-date; rather, proper utility clearance procedures were employed for all core locations to ensure that each location was free of utilities.

Utility clearance notifications for all coring locations were made by AECOM through the New Jersey One-Call system. AECOM worked with New Jersey One-Call to break the river into sections by town and submit Utility Locating Tickets for the entire 17.4-mile stretch of the river and tributaries planned for sampling. AECOM personnel tracked these tickets and all responses confirming the presence of a subsurface utility line in the river. One-Call dig tickets were resubmitted prior to their expiration date if the coring could not be performed within the allotted time.

In some cases, a map was provided by the utility company showing exactly where their lines crossed the river, and in other cases it was necessary to meet the utility company representative on-site in order to establish the line's location. Information on line crossings obtained from the utility companies was entered into the LRC project database for future reference. If requested, the utility company representatives were notified in advance of the proposed sampling date, so that representatives could be present on the riverbank to confirm that the cores were being obtained from a safe location. At locations 2008-CLRC-109 and 2008-CLRC-110, AECOM performed hand-probing to locate the existing sewer line.

Field implementation of the LRC sediment sampling program was completed with zero underground obstruction incidences.

2.6.5 Sediment Probing

Preliminary probing was conducted prior to initiation of the sample collection program to further refine the estimated core lengths in areas where coring had not been previously conducted. This initial probing was conducted for planning purposes only, and penetration depths were not formally measured.

Probing of the sediment was conducted to determine sediment thickness and the general sediment type. Probing was performed throughout the LRC program, both as a reconnaissance activity as discussed above and to gather additional subjective information regarding the coring location. Probing was conducted as described in MPI SOP-8, *Procedures for Sediment Probing* (ENSR 2008a, Appendix B).

Between RM 8.5 to RM 12.3, probing also was conducted to provide a more detailed assessment of the areal extent and thickness of the fine-grained sediment deposits. Probing information for each location within RM 8.5 to RM 12.3 was recorded on Probing Logs included as part of the project files. Summarized data are presented in **Table E-1** of **Appendix E**.

2.6.6 Tide Gage Station Installation and Vertical Control

In order to establish the sediment surface elevation at each coring location, water levels of the LPR were continuously monitored at selected locations and recorded for use as reference points. Fixed water level (tide) gages that consisted of an electronic pressure transducer combined with clock and an integrated data logger (HOBO[®] model U20-001-04) were installed at 11 total locations along the LPR. The gages were installed on fixed structures (typically bridges) at a spacing of approximately one per RM to record water level information along the entire length of the LPR. Placement of the gaging stations was dependent on the sampling schedule and stations were added or removed accordingly as the investigation progressed. Water levels were recorded at 10-minute intervals with an accuracy of 0.01 foot. Information from the data loggers was downloaded approximately every 2 weeks. Tide gage station locations are shown on **Figure 2-1**; locations and corresponding water level data are included in **Appendix F**.

The reference elevations for the tide gages were surveyed at the end of the field program by GBA in association with a bathymetric survey. The data were processed to calculate the elevation of the water surface at each tide station, and then used to determine the water elevation at each coring location at the time of sampling by interpolating between the closest upstream and downstream tide stations. Using the known water surface elevation and the measured depth of water for each core, the elevation of the river bottom was then calculated for each station. River bottom elevations are included in **Table 2-2** in feet referenced to the National Geodetic Vertical Datum.

2.6.7 Vessel Positioning/Horizontal Control

Vessel positioning was performed in accordance with SOP No. LPR-G-02, *Navigation/Positioning*, with clarifications on position accuracy provided in the LRC QAPP (ENSR 2008a, Appendix A, Attachment B). These procedures are summarized below.

For each station location, a target coordinate or waypoint was predetermined and loaded into the electronic navigation charts. This survey information was entered into a Differential Global Positioning System (DGPS) stationed on board the coring vessel. The on-board DGPS was used to position the vessel as close to the target location as possible. In deep water conditions, the vessel was maneuvered immediately up-current of the target radius, the anchor dropped, and the anchor line let out until the vessel had drifted into the target radius. In general, a second anchor was set to stabilize the vessel at the target location. Once within the target radius (25 feet), the DGPS system was used to record the

actual northing and easting (New Jersey State Plane NAD83-feet) of each core attempt along with the distance from the target coordinates. This information was recorded on the Sediment Core Collection Record in **Appendix G**. For stations that were not accessible by boat, a portable (backpack-style) DGPS unit was used to identify and record the location of each sampling point.

The accuracy of the DGPS system was maintained by using a second DGPS positioned at a station with a fixed and known elevation to provide corrections to the standard Global Positioning System (GPS) signal. The fixed station used during the investigation was the USCG beacon at Sandy Hook, New Jersey. Calibration with the Sandy Hook signal was performed twice a day, at the start of field activities and at the completion of field activities, using fixed and known survey points located at the Nutley Boat ramp and at the Passaic Yacht Club.

2.6.8 Scheduling

Scheduling of sampling activities on a daily and weekly basis was based on several factors, including:

- Availability of larger coring vessel R/V *CanDu* versus smaller vessel R/V *WillDu*;
- Coring target depth;
- Sample amount previously collected and processed;
- Laboratory limitations on sample processing rate;
- Shipping deadlines;
- Site accessibility;
- Station location approval/notice-to-proceed status;
- Station priority;
- Locations of target stations (transit times);
- Tide stage/current;
- Bridge opening requirements;
- Utility clearance approval;
- Other known vessel traffic; and
- Weather.

The daily schedule was designed so that a maximum of 70 analytical samples per week were shipped to the laboratories. This rate of sample production was established based on the processing capacity of the laboratories for certain analyses and required balancing of expected core lengths (and therefore the expected number of samples) with the logistical factors listed above. In areas where thick sediment deposits resulted in long sediment cores, the capacity for core processing and laboratory analysis limited the rate at which cores could be collected.

2.6.9 Sample Nomenclature

Samples were identified using the sample nomenclature protocols, specified in the LRC QAPP (ENSR 2008a), summarized below:

Event – 08A represents the first sampling event of 2008 (the LRC program).

Sample station – 001 to 118. Sample stations were numbered sequentially starting at the mouth of the LPR and moving upriver, with side tributary locations added after the LPR locations.

Core or grab number – C1, C2, etc.; D1, D2, etc.; and G1, G2, etc. The number corresponds to the retained colocated core or grab from which the sample was processed.

Sample interval – A, B, C, etc. The sample interval designation is from the segmentation scheme based on depth below sediment surface:

<u>Interval</u>	<u>Core Depth</u>	<u>Sample Scheme</u>
A interval:	0 to 0.5 feet	(sampled in conjunction with surface grab sampling)
B interval:	0.5 to 1.5 feet	1-foot interval
C interval:	1.5 to 2.5 feet	1-foot interval
D interval:	2.5 to 3.5 feet	1-foot interval
E interval:	3.5 to 5.5 feet	2-foot interval
F, etc.:	5.5+	2-foot intervals continuing to native material or refusal

Type of sample – Sample types include field samples (S), field duplicate samples (T), equipment rinse blanks (R), and performance evaluation (P).

For example, 08A-0023-C1BS would refer to a sample obtained during the LRC (08A) from Station 2008-CLRC-023 (-0023), of Core 1 (-C1) at the 0.5- to 1.5-foot interval of Core 1 (B), and representing a field sample (S).

2.6.10 Equipment Decontamination

Sampling equipment and related materials were decontaminated in accordance with SOP No. LPR-G-03, *Equipment Decontamination* (ENSR 2008a, Appendix B). The specific decontamination procedures for equipment used to collect and process samples, including Van Veen grab samplers, core liners (Lexan and aluminum) and end caps, are summarized below:

- Alconox and tap water wash;
- Tap water rinse;
- Nitric acid (10 percent) rinse;
- DI water rinse;
- Methanol rinse;
- Hexane rinse;
- DI water rinse; and
- Air dry.

Solvent rinses were performed under a ventilation hood for decontamination of equipment within the CPG facility. Clean equipment was wrapped in aluminum foil or polyethylene sheeting, as appropriate, and marked to indicate that it was clean.

Residual acids, solvents, and wash and rinse waters were captured separately and containerized for proper disposal as IDW as described in Section 2.6.12. Decontamination of collection and process equipment was performed generally on a daily basis while batches of core liners were decontaminated as needed. The collection of equipment rinse blanks for each investigation activity is discussed in Section 2.11.1.1.

2.6.11 Sample Custody, Storage, and Shipment

Sample custody, storage and shipping procedures for the LRC program are described in SOP LRC-G-05, *Sample Custody* and SOP LRC-G-06, *Sample Packaging and Shipping*, respectively (ENSR 2008a, Appendix B). A summary of the custody, storage, and shipping procedures is provided below, including any necessary modifications to SOPs.

2.6.11.1 Field Custody, Storage, and Transport

Following collection, the grab samples were placed on ice in coolers. Cores were placed in a prefabricated container constructed to keep the cores vertically positioned and chilled by ice. Periodically throughout the day, cores and grab samples were transferred from the coring vessel to the transport vessel and from the transport vessel to a truck. Both the transport vessel and truck also were equipped with a core storage box that kept the cores vertically positioned and chilled. The cores/samples were then transported via truck to the CPG field facility where samples were received by facility personnel and stored in a walk-in sample cooler maintained at between 2 degrees Celsius (°C) and 6°C pending processing.

Samples were maintained under chain-of-custody (COC) from collection through delivery to the CPG field facility per SOP LRC-G-05, *Sample Custody* (ENSR 2008a, Appendix B). Core Field Custody and Transfer Forms are maintained in the project file.

2.6.11.2 Sample Storage, Packaging, and Shipping

Sample handling, packaging, and shipment followed procedures outlined in SOP LPR-G-06, *Sample Packaging and Shipping* (ENSR 2008a, Appendix B). Samples were stored in the walk-in cooler maintained between 2°C and 6°C prior to and following processing. The temperature of the walk-in refrigerator was monitored daily; no temperature excursions were recorded during the LRC program. The Walk-in Cooler Daily Temperature Log sheets are maintained at the CPG facility.

Prior to shipping, the shipping staff verified that sample labels were complete and accurate, covered the label with clear tape (except for VOC vials), and then taped the cap securely to the jar. Glass sample containers were wrapped with Bubble Wrap® and then placed into a Ziploc® plastic bag. Prepared samples were then stored in the walk-in refrigerator in the shipping coolers designated for each individual laboratory. COC forms were prepared for each cooler.

At the end of the day, the cooler was removed from the walk-in refrigerator and checked for accuracy by comparing the COC form against the contents of the cooler. Once any discrepancies had been resolved, the COC was signed, then a copy of the COC form was retained for the CPG field facility files, and the original COC was enclosed in a Ziploc® bag and attached to the lid on the inside of the cooler. The cooler was prepared with enough ice to keep the temperature of the samples between 2°C and 6°C during shipping. The lid was closed, custody seals attached to two sides of the lid, and the cooler securely sealed with package tape. All coolers were shipped via United Parcel Service priority overnight delivery, with the exception of the samples being submitted to TestAmerica-Edison, which were transported by laboratory courier.

2.6.12 Investigation-Derived Waste

The management of IDW was conducted in accordance with SOP LPR-G-04, *Investigation Derived Waste (IDW) Handling and Disposal* (ENSR 2008a, Appendix B). IDW generated during the LRC program included sediment residuals from the boat and processing area, spent core liners, contaminated Personal Protective Equipment (PPE), and spent equipment decontamination solutions. A brief summary of the IDW handling procedures is described below.

IDW related to core processing within the CPG facility (unused sediment, core liners, spent PPE) was containerized in 55-gallon drums within the CPG field facility and the drums labeled and dated for disposal per SOP No. LPR-G-04, *Investigative Derived Waste (IDW) Handling and Disposal* (ENSR 2008a, Appendix B).

Decontamination fluids included nitric acid, solvents, and wash and rinse waters. Residual nitric acid was collected and transferred to a separate, labeled waste acid container pending proper disposal. Residual methanol and hexane were collected and transferred to a separate, labeled waste solvent container pending proper disposal. Wash water and DI rinse water were containerized at the decontamination station and transferred to 55-gallon drums pending disposal as IDW. The drums were stored within the CPG field facility on plastic sheeting and wooden pallets. Routine inspections were performed to ensure that the drums were secure prior to their disposal.

Composite waste characterization samples were collected from the sediment and liquid IDW waste drums and analyzed for the following parameters, as appropriate for the matrix: Toxicity Characteristic Leaching Procedure (TCLP) Metals, Total CN, Total Sulfide, TCLP Pesticides, TCLP VOCs, TCLP SVOCs, TCLP Herbicides, PCB Aroclors, PCDDs/PCDFs, Paint Filter Test (free liquids), pH, Total Solids, TPH (as silica gel treated-n-hexane extractable material) and Flashpoint. It was assumed that non-sediment and non-liquid waste including used PPE, spent core liners, etc. would be classified similar to the sediment and liquid waste as a worst case scenario.

Based on the waste classification analytical results, waste profiles were completed for non-hazardous waste materials and forwarded to the initial receiving facility, Clean Venture/Cycle-Chem, Inc. (CVCC) located in Elizabeth, New Jersey for review and approval. Upon acceptance by CVCC, the non-hazardous waste materials were transported to the receiving facility by Environmental Industrial Services Corp of New Jersey located in Swedesboro, New Jersey. A summary of non-hazardous waste shipments is provided in **Table 2-6**.

Hazardous wastes generated during site activities included waste nitric acid and waste flammable solvents (methanol) that had been utilized for decontamination purposes during sediment sampling activities. A total of one 55-gallon drum of solvent waste (D001, F003) and two 55-gallon drums of nitric acid wastes (D002) were shipped off-site to CVCC on May 1, 2009 (Manifest Tracking Number 003533598 JJK).

Appendix H includes the IDW sample results, bills of lading and manifest records.

2.7 Sample Collection

Sampling activities were conducted from July 30 to December 16, 2008, and were performed in accordance with the LRC QAPP (ENSR 2008a, Appendices A and B). Three types of sediment samples were collected during implementation of the LRC program: 1) sediment cores, 2) surface grab samples, and 3) fine segmentation (core top) samples. Sampling activities were documented in field log books and on site-specific field forms located in project files. Daily Activity Logs prepared by both the AECOM and OSI boat crews are included in **Appendix I**. Sample collection procedures are discussed in the following sections.

2.7.1 Sediment Coring

Sediment coring was performed using vibracoring techniques in accordance with SOP No. LPR-S-03, *Sediment Coring Using a Vibracorer* (ENSR 2008a, Appendix B). Piston coring or push coring was implemented at some locations because it was a more appropriate coring technique based on sediment depths, sample segmentation, or accessibility. Alternate core techniques were used for tributary samples and the finer segmentation samples, and are recorded in the Sediment Core Collection Records (**Appendix G**). Piston coring was performed in accordance with SOP No. LPR-S-02, *Sediment*

Coring Using a Piston Push Core (ENSR 2008a). General LRC sampling procedures and core acceptance criteria, along with any modifications to the SOPs, are summarized in the following paragraphs.

2.7.1.1 Collection Procedures

- The sampling vessel was positioned at the predetermined core location using the techniques described in Section 2.6.7.
- Before initiating coring activities, the depth of the overlying water at each core location was measured using a survey rod/probe equipped with a flat plate at the bottom and graduated in 0.1-foot intervals. The water depth and time were recorded on the Sediment Core Collection Record (**Appendix G**); results are included in **Table 2-2**.
- A steel vibracore barrel equipped with a decontaminated Lexan liner (3 $\frac{5}{8}$ -inch outside diameter [OD]/3.5-inch inside diameter [ID] fitted with core catcher) was then lifted and slowly lowered through the water to the sediment surface. The core barrel was initially allowed to penetrate the sediment under its own weight. Each core was then collected by continuing to advance the barrel (and liner) through the sediment using vibracoring or push core techniques. The barrels were advanced from the sediment surface to the target depth and approximately 1 foot into the native material or to core refusal. The core was allowed to stabilize for 10 minutes and the penetration depth recorded.
- A core catcher was used at locations where two coring attempts resulted in insufficient sample recovery. In each of the different sections of the river (lower, upper, middle) two coring attempts were made without a core catcher. If these attempts failed at achieving acceptable recovery, a core catcher was then used in this location and subsequent locations of the same sediment type (see SOP No. LPR-S-03, *Sediment Coring Using a Vibracorer*). At locations where fine-grained sediments were encountered or the core ended in stiff clay, a core catcher was found to be unnecessary since the stiffer material acted as natural plug (this was typical for cores that exceeded 20 feet). In the event a core catcher was used, the 10-minute stabilization period was waived per FM 080731-1, included in **Appendix B**.
- Piston cores were obtained at some locations where soft sediments were encountered and the core could be hand-pushed into the sediment to the needed depth.
- Upon retrieval from the river, all cores were maintained in a vertical position for removal from the core barrel and for sectioning. This required that the core liner be secured in a specially designed retainer which allowed the core to be lowered below the boat into the river, so that the core liner could be removed from the barrel while maintaining a vertical position.
- After the cores were retrieved and the outside of the core liner was cleaned, the sediment line ("mud line") was marked and the recovery length measured and recorded on the Sediment Core Collection Record. At this point, the core penetration and sediment recovery were evaluated to determine whether the core was acceptable for processing. Acceptability criteria are discussed in the Section 2.7.1.2.
- The overlying water was drained by drilling a hole using a decontaminated 1/8-inch stainless steel drill bit approximately 1 to 2 inches below the water line. Additional holes were drilled at 1-inch intervals where the water was not turbid until the majority of the water was drained, and 3 to 4 inches of overlying water remained in the core.
- Longer cores were cut into approximately 4-foot segments using a hacksaw with a decontaminated blade to facilitate handling and ensure that the cores were maintained in a vertical position during storage on the vessel and transport to the CPG field facility. Segment ends were capped, the caps secured with tape, and labeled to indicate top and bottom orientation. Each segment was labeled with the location and then sequentially starting with the top segment designated as "A-B," the next segment "B-C," etc. (Note that the A-B, B-C, etc.

designation for the core segments was for the purpose of identifying the segments for transportation and processing at the CPG field facility, and are unrelated to the “A,” “B,” “C,” etc. designations used to identify intervals for laboratory analysis as described in Section 2.6.9.)

- The measured length and an initial description of material observed in each segment were recorded on the Sediment Core Collection Record. The segments were placed in a pre-fabricated container designed to keep the cores in a vertical position and packed with ice.
- At shallow tributary locations, 3-inch decontaminated aluminum coring tubes were used to retrieve samples using a portable (“Little Champ”) vibracore. The vibracore used aluminum liners that were advanced directly into the sediment surface. For those core samples at the tributary locations that could not be obtained using available coring techniques, a surficial grab sample was collected by hand using stainless steel utensils and transferred to a 1-gallon bucket with a Teflon liner. These sampling procedures were implemented per FM 080905-1 revised September 16, 2008 (**Appendix B**).

Any deviations to these collection procedures at individual core locations are noted in **Appendix B**.

2.7.1.2 Acceptability and Completeness of Coring

Acceptance criteria for core penetration and recovery are detailed in Section 5 of SOP No. LPR-S-03, *Sediment Coring Using a Vibracorer*, with clarifications provided in the LRC QAPP (ENSR 2008a, Appendix A). Sediment cores were deemed acceptable if the recovered core length was 80 percent or greater of the actual penetration depth. The majority of cores retained for processing (199 cores were processed, there were 345 attempted cores collected to achieve acceptability criteria) had 80 percent or greater recovery. In some circumstances, cores with less than 80 percent recovery were considered acceptable per the judgment of the Field Task Manager (FTM) (e.g., where river conditions made it difficult to adjust core locations to achieve success or where all recoveries were less than 80 percent). The rationale for this decision was noted on the Daily Activity Log (**Appendix I**). Cores with less than 80 percent recovery were primarily collected from the tributaries and above RM 12. In some cases, cores with less than 80 percent recovery were retained if the volume was needed and they were processed as secondary cores. At other locations none of the cores could be obtained with 80 percent or greater recovery (**Table 2-2**). At stations where the composition of repeated cores was similar and significant, albeit less than 80 percent, recovery was achieved, the cores were determined to be acceptable for use by the FTM in order to avoid gaps in the investigation. Of the 15 primary cores processed with recoveries less than 80 percent, 8 had recoveries of 70 percent or greater and the remaining had recoveries ranging from 43 percent to 68 percent. Penetration acceptance criteria were modified for locations where native material or refusal was encountered at depths shallower than the target depth (FM 080818-1, shown in **Appendix B**). The predicted target depth, actual penetration depth, recovered length, and percent recovery for each retained core are provided in **Table 2-2**. According to boat crew personnel, instances where the percent recovery exceeded 100 percent (as shown in **Table 2-2**) generally occurred when the core “bounced” on the denser native materials, possibly causing suction or inflow of sediment into the core. In other cases, greater recovery may have been due to expansion of sediment within the core, or at very limited locations, separation of sediments during core retrieval which may be characterized by the presence of void spaces identified during core processing.

If bottom conditions or sediment type did not allow for the recovery of an acceptable core during the collection process, the vessel was repositioned within the allowable 25-foot target radius and another attempt made for sample collection. If, after three attempts, an acceptable core could not be obtained, the target location was abandoned. The FTM then provided the field crew with two alternate locations: one directly upstream and one directly downstream of the target station at a distance of up to approximately 300 feet. One attempt was made at the first alternate location. If this attempt did not yield an acceptable core, the vessel was repositioned to the second alternate location. If this location also did not yield an acceptable core, the station was abandoned and removed from the coring program. Station abandonment criteria are included in the LRC QAPP (ENSR 2008a, Appendix A). Acceptable alternate

station locations were loaded into the navigation computer. All sample station locations and actual surveyed coordinates for each retained core are shown on **Table 2-2**. Any adjustment of stations is noted in the Comments column. Sediment Core Collection Records are provided as **Appendix G**. Material from unacceptable cores was retained, transferred to 55-gallon drums at the CPG field facility, and disposed of as IDW per Section 2.6.12.

Field completeness is defined as the percentage of samples actually collected versus those intended to be collected per the LRC QAPP (ENSR 2008a, Section 2.1). The goal stated in the LRC QAPP was greater than 95 percent field completeness. The LRC program achieved 96 percent field completeness. Three of the eight stations at which coring was not conducted were abandoned prior to sampling attempts due to either access or safety concerns; attempts were made at all other locations in accordance with acceptance criteria defined in the LRC QAPP (ENSR 2008a) (97 percent of the locations). The stations that could not be cored and were therefore abandoned are listed in **Table 2-7**, along with the reasons for abandonment. Note, the planned total number of sample intervals to be submitted to the laboratories was 14,606 (ENSR 2008a). The actual number of sample intervals processed and sent to laboratories was 15,549, or 106.5 percent (note that the LRC QAPP did not include locations 2008-CLRC-116, 117, and 118).

2.7.2 Surface Grab Sample Collection

A surface sample was attempted at each station location where cores that met the SOP requirements for acceptability were obtained, following the procedures outlined in SOP No. LPR-S-01, *Sediment Grab Sampling* (ENSR 2008a, Appendix B), to ensure collection of intact surface intervals and to ensure adequate volume was collected. Each sample was obtained per the acceptance criteria as summarized below.

2.7.2.1 Collection Procedures

- The vessel was positioned at the predetermined grab location using the techniques described in Section 2.6.7. The coordinates and depth of water were determined and recorded on the Sediment Grab Collection Record (**Appendix J**). This information is provided in **Table 2-8** for each retained sample.
- A Ted-Young-modified Van Veen grab sampler was used to collect samples from the sediment surface to approximately 0.5 feet below the surface. The grab sampler was slowly lowered through the water to the sediment surface. The sampler was slowly retrieved, opened, and the recovered sediment was evaluated for acceptability (Section 2.7.2.2). Weights were added to the sampler if required to achieve the target penetration. The target penetration depth and actual penetration or recovery depth were recorded on the Sediment Grab Collection Record and are included in **Table 2-8**. Overlying water was decanted prior to sample collection using a pipette, siphon tube, or similar device.
- At hard bottom locations (in the tributaries), sediment surface samples were obtained using a stainless steel spoon or utensil and placed directly into the sample bucket per FM-080905 (**Appendix B**).
- Grab samples retained for analysis were field screened for VOCs and H₂S with a multi-gas meter. Screening results were recorded on the Sediment Grab Collection Record along with descriptions of initial sediment type; color; reduction oxidation reaction (commonly termed redox) depth; and visual indication of organic material, debris, or sheen. A description of the material noted in each grab sample is provided in **Table 2-8**.
- Samples for Be-7, VOCs, and the surficial Group B analytes (TPH-purgeables, methyl mercury, and AVS/SEM) were collected directly from the grab sampling device by the boat crew. Overlying water was removed using a large bore pipette. The sediment was collected through the top of the grab sampler using a stainless steel spoon without releasing the sample from the

sampling device or disturbing the surface layer. Samples for Be-7 analysis were collected from the first retained grab sample by removing 0.1 feet of sediment from the sediment surface. Samples for VOCs analysis were collected from the second retained grab sample. At stations selected for Group B analysis, the surficial Group B analytes were collected from the second retained grab sample and a third grab sample was collected for Cu/Ni and sulfide analysis. Procedures for sample collection on board the vessel are described in SOP No. LPR-S-01, *Sediment Grab Sampling*, with specific instructions for collection of VOCs and TPH-purgeables in Attachment 4 of the SOP (ENSR 2008a).

- If the sediment surface was found to be covered by debris such as leaves and sticks, the presence of this material was noted and it was carefully removed prior to sediment collection. If the entire grab sample was found to consist of leaves and sticks with little or no sediment, the grab was rejected. A maximum of six attempts was allowed to collect an acceptable sample. If not successful after six attempts, the station was abandoned for analytes associated with grab samples. As previously mentioned, at five grab sample locations, insufficient sediment volume was available for selected analytes. These five locations are noted in **Table 2-4**, along with a list of the locations for which no grab sampling could be conducted.
- The remainder of each retained grab sample was transferred with a large stainless steel spoon to a 1-gallon bucket with a Teflon liner for additional processing at the CPG field facility. For Group B locations, the remainder of the second retained grab sample used to collect Group B analytes was not retained for processing. This sediment was placed in a 5-gallon bucket on the boat and then transferred to the CPG field facility where it was placed into 55-gallon steel drums pending disposal as IDW per SOP No. LPR-G-04, *Investigative Derived Waste (IDW), Handling and Disposal*.

Any deviations to these collection procedures at individual grab sample locations are noted in **Appendix B**.

2.7.2.2 Acceptability

As provided in the LRC QAPP (ENSR 2008a, Appendix B), grab samples were considered acceptable if the sediment surface was relatively level and intact with no obvious signs of disturbance such as channeling or washout (i.e., erosion patterns or angled surface from water drainage). In addition, the penetration depth had to be at least 0.5 foot and the jaws of the sampler tightly closed without substantial leaking. Grabs that were only partially filled, slumped, or showed obvious signs of washout were considered unacceptable.

At several locations, acceptable grab samples were not able to be collected, or only one acceptable grab sample could be obtained. The number of grab sample attempts and conditions at each station were documented on the Sediment Grab Collection Records (**Appendix J**). Material from unacceptable grab samples was retained, placed into 5-gallon buckets on the boat, and then transferred to the CPG field facility where it was containerized in 55-gallon drums and disposed of as IDW per Section 2.6.12.

2.7.3 Finer Segmentation Core Sample Collection

A subset of eight stations was selected for fine segmentation or “core top” sampling. Originally, these samples were to be collected using a box core; however during field work implementation, it was determined in conjunction with MPI, that the size of box coring devices available for use would not allow for adequate sample collection depth and processing. Therefore, 6-inch OD/5.75-inch ID Lexan piston cores were used. Requirements for using a piston core were outlined in the Memorandum: *Finely Segmented Sediment Core Collection and Analysis, Result of Action Items from November 12, 2008 Call* dated November 28, 2008 (AECOM 2008), and FM 081103-1 approved by USEPA November 28, 2008. Core collection procedures are summarized below.

- The vessel was positioned at a predetermined station location as described in Section 2.6.7. The location coordinates and water depth were determined and recorded on a Sediment Core Collection Record (**Appendix G**) and also are shown in **Table 2-2**.
- Once on station, the piston core liners were slowly lowered through the water to the sediment surface. The cores were then hand pushed approximately 3 feet into the sediment to ensure 100 percent of the target recovery (2 feet) while allowing for some potential sediment loss from the bottom of the core.
- The cores were retrieved on board the sampling vessel and both ends of the core capped and secured with tape. The core was then labeled with the location and with top and bottom orientation noted.
- The recovery length and recovery percentage were recorded on the Sediment Core Collection Form, along with an initial description of the sediment type. This information is included in **Table 2-2**. Cores with recovered length greater than 2 feet and 100 percent recovery were deemed acceptable for the finer segmentation stations.
- The cores were placed on ice and in a vertical, upright position pending transport to the CPG field facility.

2.8 Sample Processing

Processing of sediment cores and grab samples was performed in an enclosed area (process tent) within the CPG field facility. A ventilation system was installed in the process tent to help cool the area, promote air flow to eliminate the collection of potentially hazardous vapors within the work area, and to prevent migration of vapors to other areas within the CPG field facility. All IDW (unused sediment, core liners, spent PPE, decontamination fluids, etc.) was containerized in 55-gallon drums within the CPG field facility and the drums labeled and dated for disposal per Section 2.6.12. All process equipment was decontaminated prior to use per Section 2.6.10.

The sample collection times for the cores and grabs was considered to be when the core or grab was retrieved on the boat. Cores were maintained in a vertical orientation in the facility cooler at a temperature between 2°C and 6°C. The majority of cores were processed the day of collection. All primary cores were processed on the day of collection, and samples shipped on the same day. In a few instances, the secondary cores and grab samples were processed the following morning, however no analytical hold times were exceeded as a result of the delayed processing. The finer segmentation cores did not have the same analyte holding time constraints and were held in the facility cooler and allowed to settle prior to processing per request of USEPA.

2.8.1 Sediment Core Processing

Processing of the sediment cores was performed in accordance with SOP No. LPR-S-04, *Core Processing*, with the following modifications:

1. In order to determine the most appropriate technique for opening aluminum core tubes collected at tributary locations, an MPI representative visited the site to observe two methods of opening core segments: circular saw and electric shears. It was determined that the aluminum cores would be opened using electric shears to prevent small pieces/shards of aluminum from being introduced into the sediment sample.
2. After cutting both sides of the core liner lengthwise, sediment within each core was initially cut by slicing through the sediment, moving from top to bottom, using a single thin-wire tool for the entire core. Due to concerns of “smearing” of sediment between sample intervals, this process was modified (FM 080823-1) to use pre-cleaned spatulas at each sample interval, thus preventing potential cross-contamination between intervals.

Core processing procedures performed at the CPG field facility are summarized below.

- While still being maintained in an upright orientation, each core segment was weighed prior to processing, and the weight recorded on a Lithology Record.
- For the top segment of each core (the A-B segment), the sediment-water interface was checked and redrawn on the core tube if settling of the sediment was evident. The height of the water column was measured and entered on the Lithology Core Record. When the amount of suspended sediment did not allow for a distinction between the water column and the sediment-water interface, the cores were staged in the cooler for up to 24 hours to allow the surface sediment to settle out prior to processing. These core locations, which were limited in number, are noted in the Comments column of **Table 2-2**.
- Water above the sediment in the core was then drained by drilling holes in the liner at approximately 1-inch intervals to just above the sediment-water interface. A pipette was then used to remove as much remaining water as practical without disturbing the sediment surface.
- The top 0 to 0.5 feet of sediment (designated the A interval) was processed with the core in a vertical position by scooping out sediment to 0.5 foot below the established sediment-water interface into a clean, labeled, stainless steel bowl. The top of the core liner was then cut, while still in a vertical position, to just above the sediment surface at 0.5 foot and the core re-capped before additional processing.
- The remaining top segment and additional core segments were processed by placing the core segment on a work station fabricated to hold the core in place horizontally. A circular saw or electric shears with decontaminated blades was used to cut the Lexan liner along opposite sides of the core. (Note: that all aluminum cores were cut using electric shears to minimize the potential for introducing metal shards into the sediment samples.) The core was transferred to a processing table covered with clean plastic sheeting and the total length of sediment in the segment measured and recorded on the Lithology Record. The total length of all segments processed for each core is shown in **Table 2-2** as "Processed Length." Discrepancies between "Recovery Length" and "Processed Length" generally are due to several potential factors including: 1) measurements taken on the boat that included the core shoe (steel cutting head) if the core catcher was left in the liner; 2) potential discard of short bottom segments by the boat crew; 3) settling of suspended sediment in the top cores; 4) voids or settling of material; or 5) discard of deeper segments (by the boat crew or processing crew), which contained native material that also was present in the previous segment and were therefore not processed if sample volume was not required.
- Sediment within the core segments were split open along the vertical axis by inserting individual spatulas into each sample interval. Once the core segments were opened, the cores were scanned with a multi-gas meter to screen for VOC and H₂S vapors and a Jerome-431X meter to screen for mercury vapor.
- If VOC samples were to be collected from a pre-determined interval within the primary core, these samples were collected immediately upon opening the core halves. VOC samples were collected using TerraCore[®] samplers from discrete intervals (2.5 to 3.5 feet and from the red-brown sand or the interval above native material at the bottom of the core if not red-brown sand) and transferred to preserved vials per SOP No. LPR-S-04, *Core Processing*, Attachment 2.
- One lengthwise half of each core segment was photographed for documentation and the sediment within each core logged in detail. This information included:
 - Major soil type;
 - Minor soil type(s);
 - Unified Soil Classification System code;

- Color (Munsell system);
- Relative moisture content;
- Relative grain size;
- Relative density;
- Relative plasticity;
- Odor/sheen;
- Stratigraphic contacts; and
- Presence of organic material, debris, shells, etc.

The primary sediment type(s) at the bottom of the core and the observations noted in the cores for each station are provided in **Table 2-2**. Lithology logs developed for each core are included as **Appendix K**. Photographs of each core segment are provided in **Appendix L**.

- Once lithologic characterization was complete, sediment samples from each core were collected according to the following segmentation scheme based on depth below the sediment-water interface (designated as 0 feet) and the actual measured length of recovered sediment in the core tube:

<u>Interval</u>	<u>Core Depth</u>	<u>Sample Scheme</u>
A interval:	0 to 0.5 feet	(sampled in conjunction with surface grab sampling)
B interval:	0.5 to 1.5 feet	1-foot interval
C interval:	1.5 to 2.5 feet	1-foot interval
D interval:	2.5 to 3.5 feet	1-foot interval
E interval:	3.5 to 5.5 feet	2-foot interval
F, etc.:	5.5+	2-foot intervals continuing to native material or refusal

The segmentation scheme listed above was altered at selected 2-foot sample intervals when a distinct stratigraphic change in the sediment sequence (e.g., change in sediment size, obvious depositional boundary or unconformity) was observed. Actual depth intervals for each sample collected are shown by river mile in **Figure 2-2** and on the lithology logs in **Appendix K**.

Where red-brown sand was encountered as native material, the top 1 to 2 feet of this material was collected for limited analysis (Section 2.5.1). If red-brown clay/silt was encountered as native material, the sediment above the clay/silt was the last interval submitted for analysis as previous analysis of this clay layer by USEPA did not indicate contamination was present (MPI 2007b). Material observed at the bottom of the primary core for each station is described in **Table 2-2**, along with depth to native material, if encountered. Note that at some locations the red-brown native material was encountered at or near the top of the core, which suggests the core was retrieved from an area with minimal deposition.

- Sediment within each interval was carefully removed from the core liner, leaving a thin layer (approximately 1/8 inch) of sediment against the liner, termed the “smear zone.” The smear zone material was not included in samples collected for chemical analysis; however, if extra volume was needed, this material was included in samples collected for grain-size analysis provided that the smear zone did not appear biased towards the fine fraction. A thin layer of material (approximately 0.25 to 0.5 inch) also was left in place between the sample intervals and at the ends of each core segment.

- Sediment removed from each sample interval was placed in pre-cleaned stainless steel bowls. Organic material (sticks, leaves), rocks, or debris greater than approximately 0.5 inch in size was removed after any attached or clinging sediment was scraped off into the bowl. In limited instances, the material in the cores contained primarily coarse gravel and cobbles, with very little, if any, fine sediment. In these instances, no samples were submitted for laboratory analysis. These stations are noted in **Table 2-3**.
- The stainless steel bowl was covered and headspace readings of each sample interval were measured for VOCs, mercury, and H₂S and recorded on the Lithology Record. The highest headspace readings recorded for each core also are shown in **Table 2-3**.
- The sediment placed in the stainless steel bowls was then mixed by hand for a minimum of 5 minutes until the material appeared homogeneous.
- Sediment from each interval was then transferred to a laboratory-supplied container in order of analyte priority (refer to Section 2.5.2). Analytes to be sampled from each interval were recorded on a Sample Collection Form and the information transferred to the laboratory-specific COC form. At limited locations there was not enough sediment volume to obtain all samples for all analyses. Any omission of analytes from individual sample intervals at a station is noted in **Table 2-4**.

Any deviations from these processing procedures at individual locations are noted in **Appendix B**.

2.8.2 Grab Sample Processing

Two grab samples per station were collected, where possible, to obtain surficial sediment from the 0- to 0.5-foot depth below the sediment-water interface. Samples for Be-7, VOCs, and the surficial Group B analytes were immediately processed on the vessel (see Section 2.7.2.1). Grab samples retained for processing at the CPG field facility were used to obtain samples for analysis of sulfide, Cu/Ni, and Group C analytes (see Section 2.5.1). Processing of grab samples was conducted in accordance with the procedures specified in SOP LPR-S-1, *Sediment Grab Sampling*, Attachment 4 (ENSR 2008a). These procedures are summarized below.

- Water contained in each grab sample bucket, if present, was screened for salinity using a refractometer as described in Section 2.9.2. Salinity readings, in parts per thousand, which represent the salinity at the time and location of sampling, were recorded and are included in **Table 2-8**.
- For sediment processing at the CPG field facility, excess surface water in each grab sample bucket was removed using a pipette. Sediment from each grab sample was then transferred to a pre-cleaned stainless steel bowl for homogenization. Any large (greater than approximately 0.5 inch) pieces of organic material (e.g., sticks and leaves), rock/gravel, or debris on the sediment surface were removed from the sample. The sediment was then homogenized for approximately 5 minutes using a clean stainless steel spoon.
- Once homogenization was complete, sediment was transferred into the appropriate laboratory-supplied containers and labeled as appropriate for each analysis. Analytes sampled from each interval were recorded on a Sample Collection Record and this information was transferred to the laboratory-specific COCs.

A description of the material observed in the grab samples for each station is provided in **Table 2-8**.

2.8.3 Finer Segmentation Sample Processing

On November 14, 2008, MPI personnel visited the CPG field facility and performed a demonstration of MPI's extrusion and fine segmentation processing procedure. Subsequent to this demonstration,

AECOM personnel conducted a “dry run” to test these procedures for 6-inch OD cores. MPI and dmi personnel were present to observe the dry run for Group D sample processing. Information from these events was incorporated into the memorandum on *Finely Segmented Sediment Core Collection and Analysis* (AECOM 2008) outlining procedures for processing Group D station cores. Per USEPA requirements, Group D station samples were divided into the following five finely segmented intervals:

<u>Interval</u>	<u>Core Depth</u>	<u>Sample Scheme</u>
A interval:	0 to 2 cm	(0 to 0.07 feet)
B interval:	2 to 5 cm	(0.07 to 0.16 feet)
C interval:	5 to 10 cm	(0.16 to 0.33 feet)
D interval:	10 to 30 cm	(0.33 to 0.98 feet)
E interval:	30 to 60 cm	(0.98 to 1.97 feet)

All sample intervals from each Group D station core were obtained using procedures in MPI's LPR SOP-11: *Core Processing-High Resolution* (MPI 2006) modified per the AECOM memorandum (AECOM 2008). This core process was based on extruding the sediments from the Lexan core liner while holding the core in a vertical position. The procedure is summarized below.

- Prior to processing, each core was weighed and the total core length, sediment length, and water column was measured and recorded on a Lithology Record. Overlying water was decanted by drilling a hole above the sediment-water interface following the same procedure used for the standard-size cores.
- Each core was processed in a vertical position by extruding the sediment out the top of the core liner by pushing up on the sediment at the bottom of the core. To accomplish this, the core was placed onto a rigidly mounted piston fabricated with a steel disk mounted on a stand. The stand was tall enough so that the piston could be pushed all the way through the core, from bottom to top. The diameter of the piston was slightly smaller than the inside diameter of the core liner.
- Upon placing the core on top of the piston, the bottom plastic core cap was cut along the edge of the piston, thus freeing the piston to push up on the bottom of the sediment column, with the cap acting as a seal and barrier between the piston and the sediments. The core was then manually pushed down over the piston, thus forcing the sediments in the core upwards towards the top of the plastic core liner. The sediment was extruded just to the top of the core liner for the first push, prior to collecting the first sample interval.
- A section of clean core liner matching the diameter of the sediment core was then placed on top of the core. This clean core liner was marked with the sediment interval thickness to be collected, and held in place manually while the core was pushed down over the piston until the sediment was pushed up into the receiving tube to the measured level.
- To separate the receiving core tube from the sediment core, a thin sheet of stainless steel was inserted between the tube with the extruded sample and the top of the core liner. With the extruded sample now sitting on top of the stainless steel sheet, the sheet and receiving tube were moved to a workbench for further processing to separate the smear zone from the sediment to be processed for analysis. Note that the top sediment interval did not experience smearing, therefore the sample collected in the receiving tube was directly emptied into a mixing bowl for processing.
- Processing continued by obtaining a sub-core from inside of each interval extruded into the receiving tubes. The sub-cores were obtained by pushing a thin-wall stainless steel cylinder inside the sample liner to segregate the outer smear zone from the inner sediment to be processed. The space between the inner wall of the plastic receiving tube and the outer wall of

the stainless steel sub-sampling tube was approximately one quarter inch. The stainless steel tube containing the final sample was then emptied into a clean mixing bowl for sediment processing, and the annular ring of sediment excluded from the steel tube was disposed as IDW.

- Each sample interval placed in a stainless steel bowl was photographed, logged, and screened for VOC, H₂S, and mercury vapor. The sample was then homogenized in the bowl for a minimum of 5 minutes. Once homogenized, sediment was transferred to laboratory containers and the appropriate amount of sediment was measured on a scale to ensure that minimum volume requirements were met for each analysis. Any remaining sediment for each interval was distributed among the sample containers.

As noted above, the top interval from each core was processed without sub-sampling to remove the smear zone. Each of the remaining four intervals in a core was extruded and processed using the full procedure as described here. The sample intervals, highest headspace readings recorded, and a general description of the sediment type for each D station are provided in **Table 2-3**.

Processing procedures for station 2008-CLRC-047 were modified due to difficulty in extruding the sediment (sand) from the core. Modifications to the processing procedures were documented in NCR NC-081212-1 (**Appendix B**).

2.9 Field Measurements

2.9.1 Sediment Bulk Density Measurements

Although bulk density measurements were originally proposed on a sample basis (ENSR 2008a), this was not practical during field implementation. Instead, the average bulk density of each sediment core segment was determined (e.g., A-B segment from the sampling vessel). In order to calculate bulk density of the sediment in each core, the non-sediment elements were weighed including a per foot weight for each core liner type and weight of end caps with an average amount of tape used to secure the caps. The bulk density was determined by taking the weight of each core segment, subtracting the weight of the non-sediment elements (core liner, end-caps and tape) and volume of the overlying water column, then dividing the result by the calculated volume of sediment in the segment. Bulk density measurements were made only for locations where cores were collected; the results are provided in **Table 2-9**.

2.9.2 Salinity Measurements

The salinity of the pore water at each station was measured using a refractometer as specified by SOP LPR-S-01, *Sediment Grab Sampling*, Attachment 3 (ENSR 2008a). The water for each measurement was obtained from the grab samples transported to the CPG facility. A small pipette was used to remove a drop of the water overlying the sediment in the sample bucket. This water was considered to be interstitial pore water which had separated from the sediment during transport from the river to the processing facility. A drop of water was placed into a calibrated refractometer, and the resulting measurement recorded on a dedicated form. The resulting salinity measurements are tabulated on **Table 2-8**. The calibration procedure is described in the LRC QAPP (ENSR 2008a, Appendix B).

2.10 Sample Analysis

Samples were analyzed for the groups of analytes presented in Section 2.5.1 according to the methods specified in the LRC QAPP (ENSR 2008a). **Table 2-1** provides the analytical methods utilized for the LRC sediment sample analysis.

The majority of analyses were performed using the stated SOPs without modification. However, during the program some analyses required modification due to the sample matrix. This section provides details on modifications, as well as clarifications of the protocols used for specific analyte groups.

2.10.1 Metals

Metals analyses were performed primarily by USEPA Methods 6010B and 6020. As a modification to the LRC QAPP (ENSR 2008a), the graphite furnace technique (USEPA Method 7740) was used as a confirmatory technique for selenium for 84 of the metals samples analyzed during this program. The furnace technique was used for analysis on these selected samples due to evidence that matrix effects were impacting quantitation using the Inductively Coupled Plasma/Mass Spectrometry (ICP/MS) method. In cases where matrix effects were suspected, the laboratory analyzed the digest using the furnace technique. If the results were confirmed, the ICP/MS result was reported. If the original results were not confirmed, the furnace result was reported.

2.10.2 PAHs by HRGC/LRMS-SIM

According to the HRGC/LRMS-SIM method SOP (included in Appendix C-1 of the LRC QAPP [ENSR 2008a]), all parent PAHs are quantified using true isotope dilution. Some samples contained certain PAHs at elevated concentrations that exceeded the calibration limits of the standard dilution procedures used by the laboratory. Initial re-extraction of the over-calibration-range samples revealed that sample heterogeneity might bias the results of re-extracted smaller aliquots. Following a discussion with USEPA, the laboratory was instructed by AECOM to add post-extraction labeled standards to dilutions of the original extract to compensate for the over-calibration analyte concentrations. These results were reported for two data packages (H9A090102 and H9A140115) and were not corrected for the recovery of the original pre-extraction labeled standard addition. Only the few analytes that were over calibration range in the original analysis were selected as reportable from these data packages.

Alkylated PAH results were all flagged as estimated (J) and designated as estimated maximum possible concentration (EMPCs) because the qualitative QC requirements are not as rigorous for the alkyl PAH groups. The complex mixture in the alkyl PAH ranges does not present a consistent ion ratio and the identity of each component peak is not known. Conformity of the range markers for each alkyl group was verified during validation and the laboratory confirmed the identity of these marker peaks using full-scan mass spectrometry during method development.

2.10.3 PCB Congeners

The TestAmerica-Knoxville laboratory examined potential interferences posed by ion fragments from PCBs with higher levels of chlorination on the 12 PCB congeners designated as toxic by the World Health Organization. Screening levels were established for toxic congeners based on risk assessment criteria. The laboratory performed an interference study to determine which toxic congeners might be affected and to measure the magnitude of positive interference in each case under the chromatographic conditions used for the LRC sediment analyses. Six toxic congeners (PCB-77, -81, -105, -114, -123, and -167) were identified as being potentially affected. Sediment samples with toxic congener results exceeding the screening values were recalculated by subtracting the interference contribution (estimated by using the toxic/interference ratio from the laboratory study) and comparing the corrected result to the original result. Only results for PCB-77, -81, and -105 presented cases where the original screening values were exceeded in any sample. The maximum interference effects were calculated to be 0.1 percent, 3.6 percent, and 0.73 percent, respectively. These minimal interferences caused no changes in categorization with respect to the screening level, therefore, no additional carbon cleanup and reanalysis work was deemed necessary.

2.10.4 Pesticides by HRGC/HRMS

Qualitative identification and quantitation of toxaphene was problematic due to the inconsistent ion ratios in the complex technical mixture used for calibration. Qualitative identification was based on pattern matching with reference materials for the selected ions monitored. Quantitation was based on five selected principal peaks. Toxaphene was identified in only a single sediment sample (08A-0118-C5AS) but this result was complicated by significant matrix interferences.

2.10.5 Radiochemistry

The LRC sediments were analyzed for Be-7, Radium-226 (Ra-226), Cs-137, Pb-210 measured by Polonium-210 (Po-210), and K-40, which was added at the request of USEPA. Pb-210 activity is derived from the activity of its decay product (Po-210) so that it can be measured with greater precision. The activity of Pb-210 and Po-210 are equivalent at conditions of secular equilibrium.

2.10.6 TPH-Extractables

Two laboratories were used to analyze TPH-extractables in sediment samples. TestAmerica-Edison analyzed the first 18 percent of the sediment samples and TestAmerica-South Burlington analyzed the last 82 percent of the samples. A decision was made to move this analysis from the TestAmerica-Edison laboratory based on concerns that arose during review of the initial PE data reported by the TestAmerica-Edison laboratory. A subsequent analysis of the performance sample produced acceptable results but sufficient concern remained that the analysis was transferred to the TestAmerica-South Burlington laboratory facility. USEPA was notified of this change in laboratories.

A total of 34 samples were analyzed by both laboratories to assess the comparability of the datasets. Twelve of the duplicate Relative Percent Differences (RPDs) exceeded 50 percent and the higher value in each case was produced by the TestAmerica-South Burlington lab. The ratio of the TestAmerica-South Burlington to TestAmerica-Edison results ranged from 2 to 35. Given that the field duplicate results were largely within the established RPD limits (50 percent if both samples were present with concentrations greater than five times the reporting limit [RL]), sample nonhomogeneity was ruled out as a primary cause of the larger discrepancies. The highest interlaboratory RPDs were associated with high moisture content, but percent moisture results and settling of solids also were ruled out as causes. Experiments performed by the TestAmerica-South Burlington laboratory appeared to isolate the different solvent systems specified in the laboratories' SOPs as the major cause of the largest interlaboratory results differences. The TestAmerica-Edison laboratory used 100 percent methylene chloride per the NJDEP method; while, the South Burlington laboratory used methylene chloride and acetone (ratio of 1:1), which more efficiently extracted TPH in samples with higher moisture content. Further discussion on the data usability is included in Section 4.2.18.

2.11 Quality Assurance/Quality Control

2.11.1 Quality Control Samples

Field and laboratory QC samples were collected as part of the LRC program. The purpose of these samples was to allow the quality of the data, in terms of accuracy/bias and precision, to be evaluated. Data quality and usability is discussed in Chapter 4.0.

2.11.1.1 Field Quality Control Samples

A summary of field QC samples required for the LRC coring program was included in the LRC QAPP (ENSR 2008a). Field QC samples included field duplicate samples, trip blanks and equipment rinse blanks. Site-specific matrix spike and matrix spike duplicate (MS/MSD) samples also were collected for analysis by the laboratory. Field duplicate and MS/MSD samples were collected as subsamples of the

sample intervals processed at the CPG facility and obtained from a range of depths in different cores to provide spatial coverage.

The frequency requirement for field duplicates was a minimum of 1 per 20 samples. Collection of field duplicates was conducted by filling the sample and duplicate jars simultaneously (i.e., sediment was distributed into the sample containers in an alternating manner until each jar was filled). Field duplicates for VOCs and TPH-purgeables were collected sequentially (i.e., one container was filled and capped, followed by the other container).

Equipment rinse blanks were collected at a frequency of one per week for each sample collection or processing procedure using decontaminated equipment (i.e., grab sampler, core liner, processing equipment). In general, three equipment rinse blanks were collected per week of sampling activities for Group A chemical analytes, with the rinse blank for the grab sampler limited to VOC, sulfide, and Cu/Ni analysis. For weeks during which sediment samples were collected from at least one Group B station, rinse blanks for those Group B parameters specified in the LRC QAPP also were collected for analysis. Equipment rinse blanks were collected by pouring DI water supplied by the laboratory over and through the decontaminated equipment. Hexane was substituted for the DI water for the equipment rinse blanks for PCDD/PCDF analysis, consistent with the LRC QAPP (ENSR 2008a, Appendix B).

On October 10, 2008, a petroleum odor and slight haze were noted in the CPG field facility after the heating system was turned on. Due to concerns of potential contamination of processing equipment, an additional equipment rinse blank (08A-0033-C2DR) was collected on a stainless steel bowl and spoon located on the drying rack under the overhead heater. This sample was submitted for limited analyses of petroleum-related constituents. Results indicated low level PAHs (less than 20 nanograms per liter) in the sample; VOCs were nondetect (ND). It is not expected that the samples processed during this period were affected by the heater malfunction.

Trip blanks were supplied by the laboratory providing the analyses. Trip blanks were included in each cooler containing samples for VOC or TPH-purgeables analyses.

2.11.1.2 Laboratory Quality Control Samples

Laboratory QC samples, in conjunction with field QC samples, provide a means of assessing the accuracy and precision of the analytical data. The laboratory QC program for the LRC was based on analytical method requirements and the data quality needs of the program; a summary of the expected laboratory QC samples, frequency, and acceptance criteria was included in the LRC QAPP (ENSR 2008a). These samples included, as appropriate for the method, method/preparation blanks, laboratory control samples (LCSs), surrogates, labeled internal standards, tracers, laboratory duplicates, and MS/MSD samples. A discussion of the results for these samples and other QC measures is provided in Chapter 4.0.

2.11.2 Internal Assessments and Corrective Action

The LRC program included an assessment of the laboratories' performance prior to sample receipt, on-site laboratory audits prior to sample receipt, and field audits during the implementation of the LRC program as described further below.

2.11.2.1 Laboratory Performance Evaluation

PE samples were used as part of the overall assessment of the laboratories selected for participation in the LPRRP. The PE samples were obtained primarily from Resource Technology Corporation (RTC) of Laramie, Wyoming. A National Institute of Standards and Technology (NIST) reference material was used for the grain size PE sample since no other source was available. In addition, a NIST reference material and lake sediment obtained from Wellington Laboratories were used to provide additional

assurance regarding the PCDDs/ PCDFs analysis performed by Columbia Analytical Services. Appropriate PE samples could not be located for Atterberg limits, the radiochemical parameters (Be-7, Cs-137, Pb-210, and K-40), and AVS/SEM. PE samples were submitted to both primary and back-up laboratories and analyzed between June and August 2008.

A full list of the analyses evaluated, the PE sample source (including product name or catalog number), and the laboratories receiving the sample are provided in **Table 2-10**. A summary of the results, problems encountered, and corrective action, if required, is presented in the PE Sample memorandum, included as **Appendix M**.

2.11.2.2 Laboratory Audits

Audits of eight laboratories were conducted by AECOM personnel, with support from dmi, prior to the start of the sampling program. The on-site audits focused on the parameters to be performed by the laboratory, but also included a general assessment of the laboratory facility, quality assurance (QA) program, and data reduction and reporting systems. The laboratory audits conducted are summarized in **Table 2-11** and include details on the audit location, parameters evaluated, and date of audit. Overall observations and conclusions of the audits were documented in audit reports. Any recommended corrective actions were discussed immediately following the audit in a debriefing meeting with laboratory personnel and implemented prior to sample receipt and analysis. Laboratory audit reports are maintained in the project files.

2.11.2.3 Field Audits

A Technical System Audit (TSA) of field activities was conducted on July 31, 2008, by the AECOM QA Manager. The activities being conducted at the time of the TSA included sediment sample collection by vibracore and grab sampler, equipment rinsate blank collection, decontamination of sampling equipment, core processing, and sample packaging and shipment. The primary objective of the audit was to evaluate conformance with the LRC QAPP (ENSR 2008a). EHS practices, documentation, and PPE, as defined by the HASP Addendum (ENSR 2008b), also were evaluated during the audit. The TSA involved direct observations of procedures, a review of records, and discussions with personnel.

No major deficiencies were noted during the audit. Overall, procedures conformed to the LRC QAPP and SOPs. Issues noted in the audit were minor and were discussed with sampling personnel at the time of the audit. Audit findings were documented in an audit report which is maintained in the project files.

A second TSA, focusing on IDW sampling, handling, and recordkeeping, was conducted on September 25 through 30, 2008. The TSA was based on a record review and discussions with personnel. Findings and recommended corrective actions, which were mainly concerned with documentation, were communicated to project personnel for resolution and correction. These findings also were documented in an audit report, which is maintained in the project files.

2.11.3 Data Validation

The laboratory results for the LRC program were subjected to formal data validation as described in the LRC QAPP (ENSR 2008a). In general, the USEPA Region 2 validation SOPs were used as the basis for validation. If a Region 2 SOP was not available for a specific method, an SOP for a similar method was adopted for guidance.

Data validation was performed for each analytical fraction (laboratory method) and laboratory report (within this report, the term "Sample Delivery Group" [SDG] is used to describe the laboratory data report). A set of 20 or fewer samples received as a batch is commonly placed into a single SDG by the lab. Within this SDG there may be multiple analytical fractions (e.g., metals, cyanide, etc.); an individual

validation memo was prepared for each analytical fraction within an SDG. At a minimum, all analytical fractions within an SDG received a limited validation, as defined below. Full validation (including review of raw data and verification of selected calculations) was conducted for all PCDD/PCDF, PCB congener, and mercury analytical fractions. For all other parameters, full validation was performed on the first two SDGs received for each analytical fraction. The remaining SDGs were subjected to full validation for every tenth SDG, and limited validation for the other SDGs.

Limited validation was performed using information provided by the laboratory on their QC forms, and included no or minimal raw data review. Limited validation also included assessment of conformance with requirements specified in the method and/or LRC QAPP (ENSR 2008a) for the following data elements:

- Agreement of analyses conducted with COC requests;
- Holding times and sample preservation;
- Initial and continuing calibrations and analytical sequence;
- Mass spectrometer tuning (gas chromatography/mass spectroscopy [GC/MS] methods only);
- Internal standard performance (GC/MS methods only);
- Laboratory blanks/equipment rinsate blanks trip blanks;
- Surrogate recoveries (where applicable to the method);
- LCS/laboratory control sample duplicate (LCSD) results;
- MS/MSD results;
- Laboratory duplicate results;
- Field duplicate results;
- Interference check sample (ICS) results (ICS AB solution only; this solution contains both target analytes and known interferents);
- Inductively Coupled Plasma (ICP) serial dilution results;
- Chemical yield (tracers and carriers) (radiochemical only);
- Percent solids; and
- Quantitation limits and sample results (limited to evaluating dilutions and reanalyses).

In addition, data packages subjected to limited validation received a completeness check to ensure that the data package contained the information necessary for full validation in the event that level of validation was needed at a later date.

Full data validation added the following procedures to those described above:

- **Raw data review.** Bench sheets, copies of laboratory notebook pages, and instrument printouts were evaluated for completeness and clarity; data contained in these documents were used to confirm data reported on summary QC forms and to perform calculations when confirming sample results. For organic parameters, chromatograms were reviewed for issues such as baseline stability, peak resolution, peak shape, and confirmation that full-scale chromatograms have been presented in all cases.
- **Calculations and transcriptions.** Spot checks were performed throughout the data package to confirm at least one reported result for each QC element reviewed including (as applicable to the method) calibrations, tuning criteria, percent recoveries, and RPD values, and to verify the

presence of mass spectra for target compounds and Tentatively Identified Compounds (TICs). At least one sample concentration and quantitation limit also was confirmed by calculation from the raw data. The accuracy of mass spectral identification for TICs was not verified during full or limited data validation.

Data qualifiers were applied based on the criteria in the LRC QAPP (ENSR 2008a) and method-specific Region 2 validation SOPs where available. Professional judgment was used where other guidance was absent.

In general, the validation qualifiers and definitions employed were based on those used in the USEPA Region 2 documents referenced in the LRC QAPP (ENSR 2008a); validation qualifiers and definitions are provided in **Table 2-12**. The “B,” “JB,” and “Q” qualifiers were used exclusively for the qualification of radiochemical data.

Validation of radiochemical data is not addressed in USEPA Region 2 guidance; therefore, validation procedures were based on the guidance provided in the radiochemical guidance documents *Evaluation of Radiochemical Data Usability* (United States Department of Energy [DOE] 1997) and *Multi-Agency Radiological Laboratory Analytical Protocols (MARLAP) Manual* (USEPA 2004).

Individual reports summarizing data qualification as a result of the validation effort were prepared for each analyte group within an SDG; these data validation reports (DVRs) were submitted weekly to USEPA in four sets of reports from May 14 to June 5, 2009, per USEPA request. The qualifiers were uploaded into the LRC database as discussed in Section 2.12. A limited number of DVRs have been updated and/or completed following submittal to USEPA and are contained in **Appendix N**. The complete list of DVRs is included in **Table N-1** of **Appendix N**.

2.11.4 Third-party Evaluations

2.11.4.1 Field Oversight

USEPA's contractor, MPI, was present in the field on 38 of 63 sampling days observing sampling and sample processing. Another USEPA contractor, HydroQual, Inc., was present for 5 days at the end of the sampling program to oversee the sampling and processing of the finer segmentation (Group D) samples as described in Section 2.7.3.

2.11.4.2 Split Sample Collection and Analysis

From August 5 to December 9, 2008 (with exception of Thanksgiving week), MPI representatives were present at the CPG field facility at least 1 day per week to perform oversight of core processing and to collect split samples. MPI personnel provided the required sample containers for these samples. AECOM personnel filled both the LRC and MPI sample containers from the same homogenized sediment mixture to ensure comparability. Generally, additional sample cores were required to obtain sufficient volume for split sample analyses. The only deviation of this procedure was at Station 2008-CLRC-050: the mercury sample (C2BS) and the TOC sample (C1CS) for MPI were collected from different intervals than the LRC sample³.

Split samples collected in the processing area of the CPG field facility are shown in **Table 2-13**.

³ The reason for this anomaly was an initial inconsistency in analyte priority list, which was resolved early in the project to be consistent. Several of the MPI split sample analytes were obtained from one container, whereby the CPG utilized separate containers for most analytes. Following this instance, MPI brought an extra container for TOC and reconciled the priority for sample collection.

MPI also collected split samples during grab sampling operations on the sampling vessel. These split samples also are listed in **Table 2-13**.

2.11.4.3 Dioxin/Furan Data Adjustment

On January 25, 2011, Region 2 directed that all validated⁴ dioxin/furan (PCDD/PCDF) data generated by the CPG as part of the EPA-approved LRC QAPP should be adjusted to address what was characterized in reports prepared by Region 2's oversight consultant (Malcolm Pirnie, Inc. September 23, 2009) and an EPA Office of Water consultant (CSC Environmental Solutions March 2010 and January 2011) as a "disparity" or "systematic bias" between the split samples analyzed by the CPG's laboratory (Columbia Analytical Services [CAS]) and Region 2's laboratory (Axys Analytical Services [AXYS]). In its January 2011 report, CSC Environmental Solutions recommended a set of rules to adjust the CPG's PCDD/PCDF results as follows:

1. No adjustment is provided for CAS data for all results below CAS's Quantification Limit.
2. For all samples which were split by MPI, the CAS results are to be replaced with the results generated by Region 2's laboratory, AXYS.
3. For all remaining results, the congener-specific adjustment factors developed by CSC Environmental Solutions are to be applied.

CSC Environmental Solutions reports are provided as **Appendix S**.

It was agreed that a unique validation qualifier "F" was assigned to results replaced or adjusted based on rules 2 and 3.

For purposes of clarity and transparency, the project database was modified to include the original CAS laboratory results, the adjustment factor (where applicable), and either the substituted AXYS results or adjusted concentration. A summary of the original, replaced, and adjusted data is also provided in **Appendix T**.

The CPG prepared, and submitted to Region 2 on June 6, 2011, a comprehensive response documenting concerns related to these specific directions. Region 2, after review of the CPG's response, determined that the concerns cited would be unlikely to substantially change the need for and magnitude of the congener-specific adjustment factors developed by CSC Environmental Solutions; however, Region 2 has tasked CSC Environmental Solutions to prepare a complete response to the issues raised by the CPG in the correspondence noted above.

2.12 Data Management

2.12.1 Data Summaries

The data generated during the LRC included sample locations, sample collection and processing records, lithological descriptions, water level data, sample custody records, analytical results, and miscellaneous other records associated with field activities. Field data were either recorded manually onto standardized forms or in bound logbooks, or were entered into electronic templates on field laptop computers. Analytical results were received as data reports in Adobe Acrobat file format and as EQUIS[®] four-file electronic data deliverables (EDDs).

⁴ Worksheet 35, page 2 of the Region 2 approved LRC QAPP states "at a minimum, 100% full validation (includes review of raw data and spot check for verification of calculations) will be conducted for Dioxins/Furans, and PCB Homologs and Congeners for each sample delivery group (SDG)".

Table 2-14 lists the types of field and laboratory data that have been collected and prepared. For each data type, it is noted whether the data are provided in this report or whether they are included only by reference and are maintained in the project files.

2.12.2 Database

The LRC database is an EQUIS® 5 database maintained by AECOM. The LRC database resides on the AECOM corporate network and is routinely backed up. Access to the database is restricted to project personnel, and the ability to view and/or add or change data is restricted to qualified personnel. The LRC database contains field collection information and analytical results for reporting and inclusion in the Remedial Investigation (RI) report. Portions of the current database were submitted to the USEPA each month from October 2008 to July 2009, per the Settlement Agreement, in Region 2 multi-media electronic data deliverable (MEDD) format along with the monthly progress report.

Information about sampling activities, laboratory tests and methods, and analytical results was loaded into the database. Laboratory results in the database were updated to reflect the outcome of data validation (see Section 2.11.3), and includes QA/QC information such as field duplicates, equipment rinsate blanks, trip blanks, laboratory QC sample results, and laboratory qualifiers. The database is used for all reporting purposes, such as table, map, and graph preparation. The LRC records in the database describe:

- 726 discrete core and grab sampling locations (434 sampled, 292 attempted but not sampled);
- 1,724 descriptions of distinct lithologic layers from 244 cores;
- 8,465 discrete samples (1,432 regular field, 338 field QC, and 6,695 lab QC);
- 34,144 distinct laboratory tests;
- 677,322 individual analytical results including QC, unvalidated, and not reportable;
- Geotechnical properties of 783 samples (697 field, 86 laboratory replicates); and
- 95,733 water level observations from 10 project-specific tide gage and one United States Geological Survey stream flow gage locations.

Quality assurance of the LRC database, including data entry and reporting, is ensured following the protocols outlined in the LPRRP Data Management Plan (ENSR 2007).

2.12.3 Reporting Conventions

All sediment results are reported on a dry weight basis. Specific choices that were made in calculation and reporting of data that require additional explanation to ensure complete understanding of the final reported values are discussed below.

2.12.3.1 PCDDs/PCDFs

All results flagged as EMPCs due to ion ratio failures were treated as estimated detections (J) per USEPA Region 2 validation guidance. The method criteria for homolog group peak membership requires passing ion ratios; therefore, when 2, 3, 7, and 8 isomer results are EMPCs, the sum of 2, 3, 7, and 8 isomer results may be greater than the associated homolog group total for that level of chlorination. Note that Total Toxicity Equivalency Quotient (TEQ) values in the database were calculated by the laboratory and were not validated. Results for TEQ have not been adjusted based on validation actions.

2.12.3.2 PCB Congeners

The reporting convention used by the TestAmerica-Knoxville laboratory for PCB congeners is to report all 209 congeners as separate analytes. Coeluters are noted in the lab qualifiers by a C flag followed by the lowest congener number in the coeluting group. Summing all the congeners without correcting for coeluters will result in an erroneously high total, so in order to avoid having database users miscalculate total PCBs, a separate sum was added to the database with the Chemical Abstract Service Number ("cas_rn") of PCB and analyte name of PCB, TOTAL. All ND congener results were treated as zeros in calculating this total value.

Validation of homolog groups with respect to method blanks was performed treating the homolog results as separate analytes. Because the homolog groups were treated as separate analytes during validation, there are some cases where summation of the congeners does not equal the associated homolog group total concentration (due to the manner that blank actions were applied). Therefore, to avoid this discrepancy, after validation was completed, the homolog values were recalculated based on the final blank-corrected individual congener results so that the sums of all homolog results and the sum of all congener results for any given sample would be equal within the limits posed by rounding errors. These corrected homolog values have replaced the original validation results in the database.

Table 2-1 Analytical Methods and Laboratories

Analysis	Method Reference	Laboratory SOP	Laboratory
Butyltins	Laboratory-specific SOP	Butyltins, SOC-BUTYL, Rev. 8, 7/31/2007	Columbia Analytical Services Kelso, Washington
PCDDs/PCDFs	USEPA Method 1613B: Tetra-through Octa-Chlorinated Dioxins and Furans by Isotope Dilution HRGC/HRMS (USEPA 1994a)	Tetra- through Octa-Chlorinated Dioxins and Furans by Isotope Dilution GC/HRMS, HRMS-1613B, Rev. 6.1, 4/24/08	Columbia Analytical Services Houston, Texas
TPH-Purgeables	SW-846 Method 8015B: Nonhalogenated Organics Using Gas Chromatography/Flame Ionization Detector (GC/FID) (USEPA 1986)	Gasoline Range Organics Using GC/FID Method 8015B, ED-GCV-006, Rev. 8, 2/18/2008.	TestAmerica Edison, New Jersey
Herbicides	SW-846 Method 8151A: Chlorinated Herbicides by Gas Chromatography (GC) Using Methylation or Pentafluorobenzoylation Derivatization (USEPA 1986)	Gas Chromatographic Analysis Method(s): SW-846 Methods 8000B, 8082, 8141A, 8151A, 8310, 8041, 8015 and USEPA Method 610, PT-GC-001, Rev. 13, 3/31/2008.	TestAmerica Pittsburgh, Pennsylvania
PAHs by HRGC/LRMS-SIM	Laboratory-specific SOP	Extraction and Isotope Dilution of Alkylated PAHs and Selected Semivolatile Organic Compounds by High Resolution Gas Chromatography-Low Resolution Selected Ion Monitoring Mass Spectrometry (HRGC/LRMS-SIM), KNOX-01-0016, Rev.6, 10/9/2007	TestAmerica Knoxville, Tennessee
PCB Aroclors	SW-846 Method 8082: PCBs by GC (USEPA 1986)	Gas Chromatographic Analysis Method(s): SW-846 Methods 8000B, 8082, 8141A, 8151A, 8310, 8041, 8015 and USEPA Method 610, PT-GC-001, Rev. 13, 3/31/2008	TestAmerica Pittsburgh, Pennsylvania
PCB congeners	USEPA Method 1668A: Chlorinated Biphenyl Congeners in Water, Soil, Sediment, Biosolids, and Tissue (USEPA 2003)	Analysis of PCB Isomers by Isotope Dilution HRGC/HRMS, KNOX-ID-0013, Rev. 7, 7/10/2008.	TestAmerica Knoxville, Tennessee

Table 2-1 Analytical Methods and Laboratories (Continued)

Analysis	Method Reference	Laboratory SOP	Laboratory
Pesticides by HRGC/HRMS	Laboratory specific SOP	Analysis of Organochlorine Pesticides by High Resolution Gas Chromatography/High Resolution Mass Spectrometry [USEPA Methods 1699 and NYSEC HRMS-2], WS-ID-0014, Rev. 5, 10/2/2008.	TestAmerica West Sacramento, California
Pesticides by GC/ECD	SW-846 Method 8081A: Organochlorine Pesticides by Gas Chromatography (USEPA 1986)	Organochlorine Pesticides by Gas Chromatography , SOC 8081, Rev. 12, 6/2/2008	Columbia Analytical Services Kelso, Washington
SVOCs	SW-846 Method 8270C: Semivolatile Organic Compounds by Gas Chromatography/Mass Spectrometry (USEPA 1986).	GC/MS Analysis Based on Method 8270C, KNOX-MS-0016, Rev. 7, 2/9/2007	TestAmerica Knoxville, Tennessee
TPH-Extractables	New Jersey Department of Environmental Protection (NJDEP) Method: Quantitation of Semi-Volatile Petroleum Products in Waste, Soil, Sediment, and Sludge (document # OQA-QAM-025-02/08, Revision 7, 2/25/2008) (NJDEP 2008)	TestAmerica Edison, NJ: NJDEP OQA-QAM-025. Quantitation of Semivolatile Petroleum Products in Water, Soil, Sediment, and Sludge, EDS-GCS-011, Rev. 3, 06/02/2008 TestAmerica South Burlington, VT: BR-GC-009, Quantitation of Semivolatile Petroleum Products by GC/FID (NJ OQA QAM-025-02/08, 9/10/08)	TestAmerica Edison, New Jersey TestAmerica South Burlington, Vermont
VOCs	SW-846 Method 8260B: Volatile Organic Compounds by Gas Chromatography/Mass Spectrometry (USEPA 1986)	Volatile Organic Compounds by GC/MS, VOC-8260, Rev. 12, 03/21/08	Columbia Analytical Services Kelso, Washington
Metals	SW-846 Method 6010B: Inductively Coupled Plasma Atomic Emission Spectrometry (USEPA 1986)	Determination of Metals and Trace Elements by Inductively Coupled Plasma Atomic Emission Spectroscopy (ICP), MET-ICP, Rev. 18, 12/14/2006	Columbia Analytical Services Kelso, Washington
	SW-846 Method 6020: Inductively Coupled Plasma-Mass Spectrometry, (USEPA 1986)	Determination of Metals and Trace Elements by ICP/MS, USEPA Method 6020, MET-6020, Rev. 11, 5/1/2007	

Table 2-1 Analytical Methods and Laboratories (Continued)

Analysis	Method Reference	Laboratory SOP	Laboratory
	SW-846 Method 7740: Selenium (Atomic Absorption, Furnace Technique), (USEPA 1986)	Determination of Trace Metals by Graphite Furnace Atomic Absorption Spectrometry (GFAA), MET-GFAA, Rev. 18, 9/26/2008	
Mercury	USEPA Method 1631, Revision E: Mercury in Water by Oxidation, Purge, and Trap, and Cold Vapor Atomic Fluorescence Spectrometry (USEPA 2002)	BRL Procedure for USEPA Method 1631, Appendix to (1/01): Total Mercury in Tissue, Sludge, Sediment, and Soil by Acid Digestion and BrCl Oxidation by Cold Vapor Atomic Fluorescence Spectrophotometry (CVAFS), BR-0002, Rev. 010, 4/9/2008	Brooks Rand Laboratories Seattle, Washington
Methyl mercury	USEPA Method 1630, Methyl Mercury in Water by Distillation, Aqueous Ethylation, Purge and Trap, and CVAFS (USEPA 2001)	Determination of Methyl Mercury by Aqueous Phase Ethylation, Trapping, Pre-Collection, Isothermal GC Separation, and CVAFS Detection: BRL Procedure for USEPA Method 1630, BR-0011, Rev. 012, 4/1/2008	
Cr(VI)	SW-846 Method 7199: Determination of Cr(VI) in Drinking Water, Groundwater, and Industrial Waste Water Effluents by Ion Chromatography (USEPA 1986) and NJDEP publication: Standard Operating Procedure (SOP) for Analytical Data Validation of Cr(VI) (NJDEP 2005)	Cr(VI) by Ion Chromatography, GEN-7199, Rev. 2, 9/30/2005.	Columbia Analytical Services Rochester, New York
AVS/SEM	Draft Analytical Method for Determination of Acid Volatile Sulfide in Sediment, 821/R-91-100 (USEPA 1991), SW-846 Method 6010B: Inductively Coupled Plasma Atomic Emission Spectroscopy (USEPA 1986), and SW-846 Method 7471: Mercury in Solid or Semisolid Waste (Manual Cold Vapor Technique) (USEPA 1986)	Sulfides, Acid Volatile, GEN-AVS, Rev. 5, 1/26/2005 Determination of Metals and Trace Elements by Inductively Coupled Plasma Atomic Emission Spectroscopy (ICP/AES), MET-ICP, Rev. 18, 12/14/2006	Columbia Analytical Services Kelso, Washington

Table 2-1 Analytical Methods and Laboratories (Continued)

Analysis	Method Reference	Laboratory SOP	Laboratory
Radiochemistry	HASL-300 (Section 4.5.2.3) (DOE 1997b) and <i>Multi-Agency Radiological Laboratory Analytical Protocols</i> (MARLAP) (USEPA 2004)	Standard Operating Procedure for the Determination of Gamma Isotopes, GL-RAD-A-013, Revision 16, 9/12/2008 (Be-7, Cs-137, K-40, Pb-210) Standard Operating Procedure for the Determination of Radiometric Polonium, GL-RAD-A-016, Revision 10, 4/7/2008 (Pb-210 as Po-210)	GEL Laboratories Charleston, South Carolina
General Chemistry			
Ammonia	USEPA Method 350.1: Determination of Ammonia Nitrogen by Semi-Automated Colorimetry (USEPA 1993), modified by the laboratory for use with sediment matrices	Ammonia by Flow Injection Analysis, GEN-350.1, Rev. 7, 5/1/07	Columbia Analytical Services Kelso, Washington
Cyanide	SW-846 Method 9012A: Total and Amenable Cyanide: Automated Colorimetric with Off-Line Distillation (USEPA 1986)	Total Cyanides and Cyanides Amenable to Chlorination, GEN-335, Rev.12, 4/12/2007.	
Phosphorus	USEPA Method 365.3: Phosphorus, All Forms (Colorimetric, Ascorbic Acid, Two Reagent) (USEPA 1983), modified by the laboratory for use with sediment matrices	Phosphorus Determination Using Colorimetric Procedure, GEN-365.3, Rev. 9, 7/11/2008	
Sulfide	SW-846 Method 9030B: Acid Soluble and Acid Insoluble Sulfides (USEPA 1986), modified by the laboratory for use with sediment matrices	Total Sulfides by Methylene Blue Determination, GEN-9030M, Rev. 8, 1/5/2006.	
TKN	ASTM D 1426-93B: Standard Test Methods for Ammonia Nitrogen in Water (ASTM 1993), modified by the laboratory for use with sediment matrices	Nitrogen, Total and Soluble Kjeldahl, GEN-TKN, Rev. 9, 5/8/2007	
TOC	Determination of Total Organic Carbon in Sediment (USEPA 1988b)	Carbon, Total Organic in Soil, GEN-ASTM, Rev. 5, 9/5/2006	

Table 2-1 Analytical Methods and Laboratories (Continued)

Analysis	Method Reference	Laboratory SOP	Laboratory
Geotechnical			
Grain size by sieve/ hydrometer	ASTM D422: Standard Test Method for Particle-Size Analysis of Soils (ASTM 2007)	Particle Size Determination, GEN-PSP, Rev. 4, 11/11/2003	Columbia Analytical Services Kelso, Washington
Atterberg limits	ASTM D4318: Standard Test Methods for Liquid Limit, Plastic Limit, and Plasticity Index of Soils (ASTM 2005a)	Standard Test Method for Liquid Limit, Plastic Limit, and Plasticity Index of Soils, ASTM Designation: D-4318-84, current edition approved 10/26/84, published December 1984.	
Specific gravity	ASTM D854-06: Standard Test Method for Specific Gravity of Soil Solids by Water Pycnometer (ASTM 2006)	Specific Gravity, GEN-SPECGRAV, Rev 0, 6/6/2005.	
PCB Partitioning Study			
Particle Size/Density Classification and particle microscopy	Ghosh et al. 2000 Ghosh et al. 2003 Kahlil et al. 2006	Not available	University of Maryland Elliott City, Maryland
Organic Particle Petrography	ASTM D2797: Practice for Preparing Coal Samples for Microscopical Analysis by Reflected Light (ASTM 2004), ASTM D2798: Standard Test Method for Microscopical Determination of the Vitrinite Reflectance of Coal (ASTM 2009), and ASTM D2799: Test Method for Microscopical Determination of the Maceral Composition of Coal (ASTM 2005b)	Not available	Koppers Pittsburgh, Pennsylvania
TOC (water)	SM5310B: Total Organic Carbon (Combustion Method) and SW-846 Method 9060: Total Organic Carbon (USEPA 1986)	SOP No. BR-WC-002, Rev.11 Effective Date: 03/14/08 Total Organic Carbon in Water, GEN-TOC, Revision 8, 4/12/07.	TestAmerica South Burlington, Vermont
TOC (water) and heat stable soot carbon	Determination of Total Organic Carbon in Sediment (USEPA 1988b)	SOP No. BR-WC-008, Rev. 11 Effective Date: 01/01/2008	TestAmerica South Burlington, Vermont

Table 2-2 Sediment Core Collection Summary

Location 2008-CLRC-	Core Collection Date	NJ State Plane coordinates (NAD 83 feet)		River Mile	Core ID ¹	Primary Core	NJ State Plane coordinates (NAD 83 feet)		Estimated Target Depth (feet)	Core Penetration (feet)	Core Recovery (feet)	Percent Recovery (%)	Processed Length ² (feet)	Water Depth (feet)	River Bottom Elevation (feet NGVD 29)	Material at Bottom of Core (Depth to red sand or clay/silt)	Comments
		Target Easting	Target Northing				Easting (Actual)	Northing (Actual)									
001	11/20/2008	597505	682497	-0.15	C1	x	597301.82	682661.59	10	21.00	18.80	90%	18.90	25.6	-26.10	Red-brown clay and silt (17.25')	
					C2		597297.44	682660.01		9.50	9.20	97%	7.87	24.1	-25.00		
002	11/11/2008	598286	683951	0.00	C1	x	598285.74	683952.08	20	8.50	8.80	104%	8.17	15.5	-12.00	Red-brown fine sand over silt/clay (6.75' to 7.0')	
					C2		598285.36	683946.64		7.50	8.00	107%	7.54	14.8	-12.30		
003	11/11/2008	599310	685714	0.22	C1	x	599309.86	685714.27	20	14.50	14.60	101%	12.00	5.7	-5.40	Brown to red-brown sand (10.9')	
					C2		599311.54	685708.56		4.50	3.70	82%	3.78	4.8	-5.50		
004	11/25/2008	597078	683257	-0.03	C1	x	597077.03	683256.55	20	27.10	22.50	83%	20.15	23.6	-20.00	Red-brown clayey silt (19.1')	
					C2		597076.59	683253.43		9.50	9.40	99%	8.30	22.1	-19.90		
005	11/12/2008	596969	684208	0.15	C1	x	596970.16	684208.91	10	16.00	12.00	75%	12.20	22.4	-23.40	Red-brown clay and silt (11.75')	
					C2		596966.05	684209.27		4.50	3.70	82%	3.45	21.8	-23.40		
006	11/18/2008	597726	685164	0.35	C1	x	597587.97	685648.83	20	18.80	17.30	92%	17.50	3.6	-3.30	Red-brown clay/silt with sand (16.9')	Used alternate coordinates based on approved modifications per EPA/dmi.
					C2		597584.90	685650.94		4.50	4.20	93%	3.77	5.5	-3.30		
					C3		597590.34	685651.80		4.50	4.40	98%	4.14	5.8	-3.20		
007	11/19/2008	598383	686011	0.41	C2	x	598063.84	686023.11	20	20.00	19.40	97%	19.10	6.5	-3.10	Gray, dense, coarse sand	Refusal at 18.0', hard sand.
					C1		598062.50	686026.60		18.00	17.00	94%	3.85	5.1	-2.90		
008	11/24/2008	596614	685405	0.37	C1	x	596615.12	685405.69	20	18.30	16.80	92%	16.23	20.5	-18.80	Black silt over clay	Refusal at 18.3', red-brown clay and sheen noted in bottom of core shoe.
					C2		596612.41	685404.94		9.50	8.90	94%	8.20	18.4	-18.40		
009	11/10/2008	596737	686124	0.46	C3	x	596740.46	686118.62	10	18.00	14.50	81%	14.73	22.6	-23.60	Red-brown silt over clay (12.6')	
					C1		596735.05	686124.36		10.00	9.80	98%	3.85	23.7	-23.60		
010	12/8/2008	597168	686354	0.63	C2	x	596984.46	687016.48	20	30.00	27.50	92%	24.40	12.4	-14.70	Red-gray silt and clay (21.77')	
					C1		596986.96	687012.60		20.00	18.40	92%	8.00	13.7	-14.80		
011	11/13/2008	597909	686696	0.54	C1	x	597908.31	686695.92	20	18.80	19.90	106%	20.23	7.2	-2.40	Gray-green silt w/ oyster shells	Refusal at 18.8'.
					C2		597908.76	686700.80		9.50	9.50	100%	8.00	7.4	-2.50		
012	12/4/2008	596647	687125	0.66	C1	x	596648.85	687126.15	20	16.00	14.70	92%	14.33	12.7	-13.70	Dark brown-black silt	Refusal at 16.0' due to infrastructure (debris area).
					C2		596645.29	687124.22		11.70	11.20	96%	7.97	13.1	-13.50		
013	11/17/2008	596898	687639	0.74	C2	x	596896.21	687635.58	18	19.00	15.60	82%	15.50	20.7	-19.10	Red-brown silt (15.6')	Red-brown silt noted in bottom of core shoe.
					C1		596899.11	687639.06		19.00	14.90	78%	11.82	19.4	-19.50		
014	12/3/2008	597430	687665	1.03	C1	x	597607.05	689071.73	20	26.00	23.10	89%	23.18	8.4	-8.00	Sand with small to med reddish gravel (22.6')	
					C2		597611.16	689068.72		9.70	9.00	93%	8.54	10.0	-8.00		
015	11/12/2008	597193	689657	1.11	C2	x	597193.45	689658.21	10	18.00	13.40	74%	13.15	6.0	-2.70	Dark gray-brown silt	Due to native material not retained due to limitation of equipment
					C1		597193.58	689657.27		10.00	7.10	71%	3.96	6.2	-2.50		
016	12/1/2008	597437	689554	1.11	C1	x	597439.98	689556.13	15	21.70	20.30	94%	20.25	19.6	-17.10	Red-brown silt with very fine sand (19.75')	
					C2		597439.80	689550.09		9.50	8.00	84%	7.55	20.2	-16.80		
017	12/2/2008	597667	689292	1.07	C1	x	597668.78	689293.07	15	30.00	29.70	99%	28.55	8.4	-7.70	Red-brown silt (25.0')	
					C3		597663.79	689291.14		5.00	4.60	92%	4.10	10.2	-7.70		
					C2		597666.49	689294.80		4.80	4.00	83%	3.50	10.1	-7.80		
018	11/10/2008	597701	691423	1.47	C1	x	597700.68	691425.57	15	14.60	13.60	93%	13.77	8.5	-5.60	Gray-brown silt and fine sand	Clay noted in bottom of core shoe at approx. 13'. Void in core at 11.83' - 12.0'.
					C2		597701.12	691423.67		4.50	3.80	84%	3.18	7.4	-5.60		
019D	12/4/2008	597976	691370	1.45	D1		597960.89	691369.94	2.5-3	3.00	3.10	103%	3.26	19.7	-17.50	Black silt ³	D' station location.
019	9/24/2008	597976	691370	1.47	C3	x	597977.34	691367.74	5	6.00	5.30	88%	4.00	17.4	-17.80	Black silt	Target Depth to 5 ft for recent sediments only.
					C1		597975.04	691369.53		6.00	5.90	98%	5.27	18.2	-17.80		
					C2		597973.88	691367.66		6.00	4.40	73%	3.66	17.7	-17.70		
020	11/4/2008	598203	691321	1.47	C2	x	598203.64	691321.50	15	13.50	12.10	90%	11.60	4.5	-4.30	Gray-brown to black silt	Refusal at 13.5'; gray sand and gravel.
					C3		598202.03	691321.44		9.70	8.70	90%	8.10	5.2	-4.40		
					C4		598204.79	691326.81		4.70	4.20	89%	3.85	5.6	-4.40		
021	11/6/2008	598324	693855	1.94	C1	x	598323.52	693855.06	15	14.00	13.70	98%	11.85	26.5	-25.30	Red-brown silty clay (11.4')	
					C2		598323.50	693856.58		9.00	8.00	89%	7.95	26.2	-25.20		
022D	12/3/2008	595458	695202	2.62	D2		595456.83	695203.66	2.5-3.0	3.10	3.10	100%	3.05	1.8	0.60	Black silt ³	D' station location.
022	11/3/2008	595458	695202	2.64	C1	x	595458.74	695201.33	15	14.50	14.15	98%	14.13	2.5	0.60	Gray-brown fine sand	Gray-red sand noted in bottom of core shoe at approx. 14'.
					C2		595459.64	695200.21		4.50	4.10	91%	3.92	2.6	0.60		
023	11/5/2008	595563	695459	2.62	C2	x	595567.32	695458.53	15	17.00	16.50	97%	15.83	11.8	-9.60	Red-brown sandy silt (15.25')	
					C1		595561.92	695458.83		15.00	13.50	90%	3.77	10.7	-9.50		
024	10/30/2008	595561	695766	2.62	C1	x	595560.39	695766.62	15	13.00	13.40	103%	12.03	16.9	-13.70	Red-brown silty clay/clayey silt (10.65')	
					C2		595557.65	695764.89		9.00	7.80	87%	7.28	17.4	-13.90		

Table 2-2 Sediment Core Collection Summary (Continued)

Location 2008-CLRC-	Core Collection Date	NJ State Plane coordinates (NAD 83 feet)		River Mile	Core ID ¹	Primary Core	NJ State Plane coordinates (NAD 83 feet)		Estimated Target Depth (feet)	Core Penetration (feet)	Core Recovery (feet)	Percent Recovery (%)	Processed Length ² (feet)	Water Depth (feet)	River Bottom Elevation (feet NGVD 29)	Material at Bottom of Core (Depth to red sand or clay/silt)	Comments
		Target Easting	Target Northing				Easting (Actual)	Northing (Actual)									
025	11/3/2008	594361	695470	2.85	C1	x	594361.07	695470.17	10	9.50	8.80	93%	8.77	17.1	-15.60	Red-brown sand (8.7')	
					C3		594358.12	695468.89		4.80	4.50	94%	3.68	18.0	-15.60		
026	10/28/2009	592599	695423	3.17	C1	x	592600.84	695422.30	15	7.40	6.70	91%	5.98	6.7	-1.10	Gray-green to black clay with silt	Refusal at 6.7', red-brown sand & gravel noted in bottom of core shoe.
					C2		592602.20	695427.12		6.70	6.50	97%	5.81	6.5	-0.90		
027	10/29/2008	591239	694157	3.52	C1	x	591239.45	694158.03	15	14.50	14.50	100%	14.29	12.4	-10.10	Black stained clay w/ red- brown clay (13.75')	
					C2		591241.73	694154.72		4.50	4.60	102%	3.75	11.3	-10.20		
028	11/5/2008	591151	694213	3.53	C2	x	591148.05	694214.63	10	10.00	9.20	92%	9.10	15.4	-15.30	Brown & red-brown silt/clay w/ cobbles (8.7')	Void in core at 4.2' - 4.65'.
					C1		591150.50	694214.58		9.50	8.70	92%	3.44	14.9	-15.20		
028D	12/8/2008	591151	694213	3.51	D1	x	591147.95	694208.73	2.5-3.0	2.50	2.50	100%	1.97	13.6	-15.20	Black silt ³	D' station location.
029	10/29/2008	591048	694264	3.53	C1	x	591048.50	694266.40	10	9.50	10.00	105%	10.01	19.3	-16.40	Gray & red-brown clay (9.05')	Void in core at 6.5' - 6.85 and bottom of core at 9.8' - 10.01'.
					C2		591051.06	694264.88		4.50	4.50	100%	4.32	19.2	-16.30		
					C3		591046.27	694263.02		4.70	4.60	98%	4.27	19.0	-16.30		
030	10/27/2008	588236	692271	4.25	C1	x	588236.97	692271.50	10	9.20	9.10	99%	8.73	20.5	-16.00	Red-brown silt (8.65')	
					C2		588237.80	692266.83		4.70	4.60	98%	4.10	20.0	-16.10		
031	10/23/2008	588233	692388	4.25	C1	x	588232.98	692388.54	10	9.80	11.70	119%	11.21	20.8	-19.70	Red-brown silt and silty clay (7.6' to 8.2')	Heavy sheen visible through core liners.
					C2		588233.55	692391.07		8.20	8.50	104%	7.88	20.0	-19.90		
032	10/23/2008	588227	692539	4.24	C2	x	588222.28	692540.62	15	13.30	12.70	95%	12.10	12.5	-12.70	Dark gray sand w/ trace red brown coarse sand	Refusal at 13.3'.
					C1		588226.44	692539.02		9.60	9.60	100%	3.98	12.3	-12.60		
033	10/22/2008	585378	694444	5.00	C1	x	585378.15	694445.60	10	9.50	9.60	101%	7.65	13.7	-15.20	Dark gray to red-brown sand and gravel (3.8' to 6.3')	
					C2		585377.39	694443.53		9.00	8.00	90%	6.30	14.7	-15.60		
034	10/22/2008	584862	695962	5.30	C1	x	584863.43	695962.95	5	3.50	3.00	86%	2.70	17.0	-17.60	Black stained gravel w/ sand/silt	Refusal at 3.5', fine red-brown sand & gravel in bottom of core shoe. Heavy sheen observed in core shoe.
					C3		584861.13	695957.84		3.20	3.10	97%	2.32	16.2	-17.30		
034D	12/8/2008	584862	695962	5.30	D2	x	584856.31	695959.93	2.5-3.0	2.75	2.75	100%	1.97	19.2	-17.50	Black silt ³	D' station location.
035	9/23/2008	584733	697058	5.51	C5	x	584726.66	697054.40	5	6.00	6.20	103%	3.94	23.3	-24.40	Red-brown silt (0.0' to 0.6')	
					C6		584727.20	697057.44		5.00	5.50	110%	3.85	NR	-24.40		
036	10/21/2008	584571	697029	5.51	C2	x	584570.02	697031.74	10	8.10	8.30	102%	7.97	16.5	-12.80	Black stained gravel w/ sand, silt	Refusal at 8.1'. Void in core at 4.7' - 4.8'.
					C1		584571.97	697027.29		7.50	6.40	85%	6.05	16.5	-13.80		
037	10/20/2008	584808	697060	5.51	C1	x	584810.07	697059.41	10	5.80	5.50	95%	4.91	18.7	-14.50	Gray sand and gravel	Refusal at 5.8'.
					C2		584806.08	697059.25		5.00	3.30	66%	2.76	20.3	-15.50		
038	10/21/2008	585066	699604	6.00	C1	x	585065.99	699603.68	15	7.70	10.10	131%	7.75	13.8	-14.20	Silt with sand & gravel	Several voids in C1, adjusted sediment length is 6.51' w/o voids; Void in C2 at 5.3' - 5.6'.
					C2		585066.80	699604.71		8.00	8.90	111%	8.40	14.2	-14.20		
039	10/20/2008	585244	701011	6.27	C1	x	585242.16	701012.99	15	12.30	10.60	86%	10.40	14.3	-9.30	Dark brown silt w/ clay	Refusal at 12.3'. Sheen observed in core shoe.
					C2		585243.56	701011.10		5.00	5.00	100%	4.22	14.0	-9.50		
040	9/24/2008	585518	702181	6.49	C1	x	585513.96	702183.09	5	6.00	6.10	102%	5.30	15.6	-16.60	Gray sand and gravel	Target Depth to 5 ft for recent sediments only.
					C3		585520.10	702179.84		5.50	4.40	80%	2.30	16.3	-16.20		
041	9/22/2008	585602	702137	6.49	C1	x	585602.36	702138.22	5	5.50	5.50	100%	4.68	14.8	-16.10	Black fine sand w/ silt	Target Depth to 5 ft for recent sediments only.
					C2		585598.81	702136.58		6.00	4.50	75%	3.80	15.0	-16.10		
042	9/22/2008	585643	702116	6.50	C2	x	585641.32	702120.41	5	6.00	6.20	103%	5.35	16.0	-15.10	Black silt	Target Depth to 5 ft for recent sediments only.
					C1		585642.78	702117.08		6.00	4.40	73%	3.65	14.9	-14.90		
043	8/19/2008	586932	704435	7.00	C2	x	586923.60	704432.89	8	8.50	7.40	87%	6.45	10.7	-9.40	Red-brown fine sand (3.0' to 3.5')	C2 B-C segment has 0.11' void at top of core.
					C4		586927.42	704435.39		5.00	5.10	100%	3.87	12.6	-9.70		
					C5		586929.15	704438.33		5.00	5.00	100%	3.43	13.0	-9.40		
044	8/19/2008	587070	704369	7.00	C1	x	587069.14	704368.86	8	6.00	6.75	112%	5.90	20.5	-17.20	Red-brown sand (5.6' to 6.6')	
					C3		587069.81	704364.87		5.30	8.15	153%	6.76	19.5	-17.40		
045	8/20/2008	587161	704313	7.00	C2	x	587158.38	704314.44	8	13.70	13.20	96%	13.00	8.0	-6.70	Brown silt w/ red-brown silt inclusion (12.6')	
					C1		587160.60	704312.07		9.50	9.00	95%	8.12	5.9	-5.80		

Table 2-2 Sediment Core Collection Summary (Continued)

Location 2008-CLRC-	Core Collection Date	NJ State Plane coordinates (NAD 83 feet)		River Mile	Core ID ¹	Primary Core	NJ State Plane coordinates (NAD 83 feet)		Estimated Target Depth (feet)	Core Penetration (feet)	Core Recovery (feet)	Percent Recovery (%)	Processed Length ² (feet)	Water Depth (feet)	River Bottom Elevation (feet NGVD 29)	Material at Bottom of Core (Depth to red sand or clay/silt)	Comments
		Target Easting	Target Northing				Easting (Actual)	Northing (Actual)									
046	8/20/2008	587705	706679	7.45	C2	x	587705.85	706683.04	8	1.10	3.80	345%	2.50	14.2	-10.20	Red-brown sand (0.2')	Station moved 300' downriver, only one core retained for processing; sand & gravel highly disturbed.
047	7/30/2008	587831	706609	7.45	C1	x	587833.66	706607.08	8	8.00	7.85	98%	7.17	16.4	-13.80	Dark brown to red-brown fine sand (5.2')	
					C4		587826.66	706604.64		4.60	4.23	93%	3.45	13.2	-14.00		
047D	12/9/2008	587831	706609	7.45	D4	x	587823.96	706610.15	2.5-3.0	2.60	2.60	100%	1.97	13.9	-14.20	Dark brown-black silt and sand ³	D' station location.
048	7/31/2008	587985	706484	7.44	C2	x	587985.28	706484.99	8	7.00	7.80	111%	7.30	5.6	-2.20	Red-gray gravel w/ sand (6.2')	Void at 4.4-4.8 filled w/ water and suspended fines.
					C3		587982.93	706482.40		5.40	6.00	111%	5.45	4.3	-2.20		
049	8/6/2008	589179	708327	7.86	C1	x	589179.08	708328.47	8	6.50	4.15	64%	3.68	9.8	-11.30	Red clay w/ gravel (5.2')	
					C2		589183.05	708325.45		7.50	6.50	87%	6.20	10.3	-11.30		
050	9/3/2008	589357	708818	7.97	C1	x	589359.01	708814.87	8	3.60	3.60	100%	3.24	2.6	-2.40	Dark brown gravel w/ sand and silt	Red-brown sand & gravel noted in bottom of core shoe at 2.8' to 3.6'.
					C2		589357.88	708818.48		3.50	2.85	81%	2.47	3.5	-2.40		
					C3		589358.84	708822.50		3.20	2.80	87%	2.53	4.3	-2.50		
051	8/26/2008	589473	708766	7.97	C1	x	589473.28	708764.30	8	2.30	2.30	100%	1.60	14.8	-13.90	Dark gray-brown sand	Refusal at 3', red-brown sand noted in core shoe. C2 length 3.1' w/ core catcher.
					C2		589471.53	708765.64		3.00	3.40	113%	3.10	13.3	-12.80		
					C4		589480.14	708764.32		2.30	3.50	152%	2.75	12.9	-13.00		
052	8/26/2008	589616	708721	7.97	C2	x	589597.65	708728.08	8	3.00	1.50	50%	1.14	7.0	-8.20	Red-brown gravel w/ sand (0.2' to 0.3')	C2 length 1.14 w/ core catcher; C3 length 1.27 w/ core catcher. Attempted upstream and downstream locations.
					C3		589593.07	708727.66		2.20	1.40	64%	1.27	7.0	-8.30		
053	8/27/2008	589474	709581	8.1	SA		SA	SA	8	SA	SA	SA	SA	SA	SA	SA	Station abandoned after 5 attempts; refusal at approx. 0.5'.
054	8/27/2008	589586	711235	8.44	C3	x	589585.04	711238.86	8	7.00	7.10	101%	4.05	15.4	-15.90	Red-brown sand (2.2')	
					C1		589585.99	711233.75		4.60	3.30	72%	2.81	15.9	-15.60		
055	8/7/2008	589694	711214	8.44	C2	x	589686.18	711213.49	8	10.00	8.20	82%	7.70	6.7	-7.60	Red fine sand (7.0')	
					C3		589683.95	711214.69		10.00	8.00	80%	3.85	7.3	-7.70		
056	8/27/2008	590945	713740	8.98	C2	x	590947.16	713743.71	10	15.00	14.60	97%	14.25	14.2	-15.90	Red-brown fine sand (13.35')	
					C1		590946.31	713740.12		10.00	9.50	95%	3.74	14.2	-15.80		
057	8/4/2008	591108	713659	8.99	C1	x	591107.37	713658.34	8	9.80	8.45	86%	8.40	2.4	-1.90	Red-brown sand (8.05')	Native material observed in C2.
					C2		591111.85	713657.85		9.80	9.10	93%	9.10	4.1	-1.70		
058	8/11/2008	592071	715758	9.42	C1	x	592070.02	715755.90	6	9.60	9.60	100%	9.22	10.2	-9.30	Red-brown sand w/ gravel (7.75')	
					C2		592071.32	715757.36		4.00	3.70	92%	3.65	8.8	-8.90		
					C3		592072.47	715760.08		4.20	4.00	95%	3.88	8.2	-8.40		
059	8/12/2008	592264	716454	9.5	C4	x	592269.09	716133.03	6	9.00	9.75	108%	8.12	15.7	-15.50	Red-brown silt and sand w/ gravel (0.0' to 0.4')	Trap rock in bottom of liner, possible utility; moved station 300' downriver.
					C5		592262.99	716137.23		5.00	4.60	92%	4.00	14.5	-15.00		
060	8/6/2008	592488	716442	9.57	C1	x	592486.50	716439.49	6	8.60	8.71	101%	8.27	2.4	0.40	Red sand (8.8')	Native material observed in C2.
					C2		592484.81	716441.12		9.80	9.80	100%	9.30	3.2	0.30		
061	9/3/2008	591892	718819	10.03	C1	x	591890.96	718818.14	6	6.00	6.45	107%	6.43	15.2	-11.40	Red-brown, very fine sand (4.5' to 6.0')	
					C2		591892.20	718821.78		6.50	6.00	92%	5.48	15.6	-11.40		
062	8/13/2008	592093	718741	10.02	C1	x	592092.73	718742.54	15	14.00	14.20	100%	13.64	7.8	-5.60	Red-brown sand w/ silt (10.6')	
					C2		592097.99	718741.15		3.50	3.50	100%	3.51	7.2	-5.30		
062D	12/9/2008	592093	718741	10.00	D1	x	592091.31	718739.91	2.5-3.0	2.60	2.60	100%	2.00	6.9	-5.50	Dark brown to black silt w/ little clay ³	D' station location.
063	8/12/2008	592082	720029	10.27	C1	x	592081.09	720027.34	6	8.00	7.00	88%	6.35	11.4	-11.60	Reddish sand over red clay (3.0'-3.8')	
					C2		592082.19	720027.42		5.00	4.00	80%	3.40	12.6	-12.10		
064	8/25/2008	592228	721507	10.55	C1	x	592228.10	721507.24	6	6.00	7.20	120%	3.78	15.0	-15.10	Red-brown silt and silty sand (1.75')	
					C2		592225.87	721503.92		6.00	6.50	108%	3.80	14.7	-15.10		

Table 2-2 Sediment Core Collection Summary (Continued)

Location 2008-CLRC-	Core Collection Date	NJ State Plane coordinates (NAD 83 feet)		River Mile	Core ID ¹	Primary Core	NJ State Plane coordinates (NAD 83 feet)		Estimated Target Depth (feet)	Core Penetration (feet)	Core Recovery (feet)	Percent Recovery (%)	Processed Length ² (feet)	Water Depth (feet)	River Bottom Elevation (feet NGVD 29)	Material at Bottom of Core (Depth to red sand or clay/silt)	Comments
		Target Easting	Target Northing				Eastings (Actual)	Northing (Actual)									
065	8/28/2008	592388	721477	10.55	C3	x	592387.10	721482.19	6	14.30	14.30	100%	13.83	4.0	-1.50	Fine to coarse sand w/ gravel	Red clay observed in core catcher at approx. 14.0'.
					C1		592388.28	721477.37		7.00	7.10	101%	4.00	5.1	-1.30		
066	8/21/2008	593072	723331	10.93	C1	x	593073.18	723330.82	6	8.60	6.50	76%	5.77	9.0	-11.60	Red fine sand (5.5')	
					C2		593079.92	723328.35		8.70	6.80	78%	3.97	11.8	-11.60		
067	8/5/2008	593181	723166	10.93	C2	x	593178.51	723188.90	6	6.50	7.38	123%	6.90	2.0	-1.10	Red brown sand w/ gravel (5.15' to 6.0')	Location moved upstream due to utility concerns (EPA approved) and tide conditions.
					C3		593179.55	723185.55		6.60	6.58	99%	6.19	3.2	-1.00		
068	9/4/2008	595000	724016	11.32	C1	x	595000.34	724014.00	6	9.50	9.65	102%	8.00	8.7	-9.90	Red-brown very fine sand & silt w/ gravel (5.85' to 6.1')	
					C2		594998.34	724014.71		9.50	8.70	92%	7.97	9.5	-9.60		
069	9/4/2008	595819	724484	11.51	C1	x	595821.83	724486.42	6	7.00	7.60	109%	6.96	12.8	-9.50	Red-brown very fine sand and silt (5.3')	
					C2		595819.78	724484.11		7.00	7.30	104%	4.00	13.0	-9.20		
070	9/2/2008	595944	724353	11.51	C3	x	595937.79	724351.80	6	8.00	8.20	102%	7.56	13.4	-9.60	Red-brown very fine sand and silt (5.21')	No distinct mudline, top 1.5' very liquid w/ suspended fines.
					C2		595932.39	724350.71		4.50	5.10	113%	3.60	15.2	-12.00		
070	9/10/2008	595944	724353	11.50	C1	x	595928.46	724369.35	6	4.00	3.50	88%	DNP	14.6	NS	Did not process	Did not process, top sediment (suspended fines) never settled.
					C2		595927.45	724365.41		4.00	3.50	88%	DNP	15.0	NS		
1070 ⁵	9/15/2008	595944	724353	11.50	C2	x	595928.34	724369.98	6	5.50	5.20	95%	4.02	13.5	-15.40	Red-brown silt, sand, and clayey silt (0.0')	3rd attempt at station 070; let top suspended sediment settle several days. All native material.
					C1		595940.83	724376.47		4.90	4.00	82%	3.40	15.2	-16.20		
071	8/14/2008	596759	726685	11.98	C1	x	596757.29	726684.48	4	3.80	4.00	105%	3.45	17.2	-14.30	Red brown sand w/ trace gravel (2.6')	
					C3		596753.14	726682.13		3.00	2.60	86%	1.90	16.9	-14.10		
072	8/18/2008	596854	726667	12.03	C6	x	596922.16	726951.20	4	2.80	3.18	114%	2.42	12.1	-12.10	Red-brown fine sand w/ silt and gravel (0.5')	Station moved 300' upstream due to hard substrate.
					C7		596926.27	726949.49		2.90	3.36	116%	2.86	10.4	-11.10		
073	8/14/2008	596913	728361	12.3	C4	x	596911.10	728357.31	6	4.50	4.30	96%	4.00	7.6	-7.90	Red-brown med-coarse sand w/ gravel (2.7')	
					C2		596908.33	728360.22		3.30	ND	ND	3.42	7.9	-7.50		
074	8/18/2008	596404	729621	12.56	C2	x	596402.57	729622.11	3	9.80	9.20	94%	8.85	7.1	-4.21	Red brown sand (8.38')	
					C1		596403.30	729619.06		4.50	4.10	91%	4.13	6.5	-4.10		
075	8/18/2008	596522	729656	12.56	C1	x	596522.09	729657.09	6	9.00	8.30	92%	3.88	19.6	-16.10	Alternating layers red-brown silt & sand (1.43' to 1.56')	
					C2		596522.49	729653.18		4.50	3.50	82%	2.69	18.8	-15.90		
076	9/8/2008	596110	731058	12.79	C5	x	596104.00	730760.85	4	4.10	4.90	120%	3.90	15.7	-15.60	Red-brown sand & silt, some gravel w/ depth (1.13'-2.6')	Station moved 300' downstream.
					C4		596108.73	730757.25		4.00	3.20	80%	2.62	15.0	-15.30		
077	9/8/2008	596225	731023	12.84	C2	x	596231.66	731023.20	4	5.50	4.50	82%	3.83	15.0	-12.90	Red-brown sand & gravel (2.6' to 3.2')	
					C5		596232.76	731019.60		5.00	3.85	77%	3.22	15.1	-12.30		
078	9/2/2008	596800	732963	13.23	C1	x	596799.89	732962.98	6	8.50	8.00	94%	8.10	15.9	-13.20	Red brown sand (8.5')	Native material observed in C3.
					C3		596802.69	732958.28		9.50	9.00	95%	8.63	13.9	-13.00		
078D	12/11/2008	596800	732963	13.23	D4	x	596799.49	732955.94	2.5-3.0	2.50	2.50	100%	2.00	11.3	-11.40	Dark brown silt ³	D' station location.
079	9/9/2008	597243	734738	13.58	C4	x	597251.79	734735.79	6	8.20	6.50	79%	5.87	12.5	-11.20	Brown silty sand and clay	Clay noted in core shoe at approx. 6.5'.
					C2		597246.26	734739.14		5.50	3.50	64%	2.94	10.8	-11.10		
080	9/10/2008	597368	734715	13.58	C1	x	597365.47	734715.19	6	6.20	5.50	89%	5.43	14.4	-13.70	Dark brown fine sand	Sheen observed in material at bottom of core shoe.
					C2		597369.65	734714.71		6.20	5.40	87%	4.86	14.1	-13.70		
081	9/10/2008	597321	737374	14.09	C2	x	597322.95	737368.54	6	5.00	3.80	76%	3.10	14.9	-16.40	Gray-brown sand w/ gravel & fill	Refusal at 5.0' and 5.5'.
					C3		597326.68	737368.37		5.50	3.80	69%	3.19	15.3	-16.30		
082	12/10/2008	597457	737355	14.09	C2	x	597453.43	737358.61	6	19.80	19.00	96%	18.90	1.3	0.80	Brown to red-brown silt w/ very fine sand (16.9')	Initial attempt (9/11/08) had 8.6' penetration w/ no native material, recollected w/ longer core barrel.
					C1		597452.70	737356.41		10.00	9.50	95%	8.50	1.9	0.70		
083	9/11/2008	597459	737973	14.21	C2	x	597461.6	737974.22	6	6.00	4.80	80%	4.14	17.1	-16.80	Gray-brown sand, gravel, & slag	Refusal at 5.9', clay plug in bottom of core shoe.
					C1		597457.71	737973.27		5.90	4.35	74%	3.69	17.3	-16.80		

Table 2-2 Sediment Core Collection Summary (Continued)

Location 2008-CLRC-	Core Collection Date	NJ State Plane coordinates (NAD 83 feet)		River Mile	Core ID ¹	Primary Core	NJ State Plane coordinates (NAD 83 feet)		Estimated Target Depth (feet)	Core Penetration (feet)	Core Recovery (feet)	Percent Recovery (%)	Processed Length ² (feet)	Water Depth (feet)	River Bottom Elevation (feet NGVD 29)	Material at Bottom of Core (Depth to red sand or clay/silt)	Comments
		Target Easting	Target Northing				Eastings (Actual)	Northing (Actual)									
084	12/9/2008	597562	737988	14.20	C1	x	597560.99	737989.36	8	20.00	19.70	99%	12.35	4.0	-4.10	Red-brown very fine sand (9.8')	Bottom core segment contained red sand; not retained for processing.
					C2		597562.46	737985.93		9.70	9.00	93%	8.53	2.9	-3.20		
085	12/11/2008	599480	736942	14.81	C1	x	599481.27	736941.90	6	18.50	19.60	106%	16.25	7.1	-3.40	Red-brown silt (15.0')	Initial core attempt (9/18/08) did not reach native material, recollected with longer core barrel.
					C2		599480.49	736944.26		9.50	8.30	87%	7.85	6.1	-3.30		
086	9/16/2008	600476	737112	15.07	C3	x	600465.61	737117.24	6	6.00	5.30	88%	4.85	10.3	-8.40	Red-brown-gray silty clay (4.8')	Clay noted in bottom of core shoe at approx. 4.8'.
					C1		600478.72	737114.88		4.90	3.10	63%	2.55	8.7	-8.50		
					C5		600482.72	737113.23		5.80	4.60	79%	3.87	10.9	-8.50		
087	9/16/2008	600623	737046	15.07	C3	x	600624.96	737039.58	6	5.00	4.00	80%	3.65	8.9	-8.50	Gray-brown, medium to coarse sand	
					C2		600626.76	737042.05		6.00	4.00	67%	3.50	9.5	-8.40		
088	9/17/2008	600699	739256	15.50	C1	x	600701.24	739254.08	6	4.80	5.30	110%	3.85	6.3	-7.50	Red clay with little gravel (2.1' to 2.7')	
					C2		600701.21	739250.89		4.90	3.60	73%	3.15	7.4	-7.50		
					C3		600695.51	739260.72		5.10	3.60	71%	3.47	10.3	-9.40		
089	9/17/2008	600861	739285	15.50	C2	x	600855.91	739277.38	6	5.80	5.50	95%	5.00	5.7	-3.40	Red clay w/ silt (3.7' to 4.7')	
					C4		600865.05	739279.23		6.00	6.10	101%	4.15	5.5	-4.10		
090	9/11/2008	600361	739764	15.63	C5	x	600380.63	739773.04	6	6.00	2.60	43%	1.94	1.6	-5.00	Red clay w/ silt (1.6')	
					C1		600371.99	739771.43		1.80	1.60	89%	0.80	1.8	-4.30		
091	9/25/2008	599354	741319	16.00	SA		SA	SA	6	SA	SA	SA	SA	SA	SA	SA	Station abandoned after 4 attempts with Little Champ vibracore; no penetration (rocks and cobbles).
092	9/25/2008	599463	741354	16.00	C1	x	599472.07	741346.59	6	5.30	4.40	83%	4.20	4.1	-2.50	Red-brown sand w gravel over silt (0.0' to 0.7')	
					C4		599472.65	741347.67		7.60	4.70	62%	4.57	1.7	-1.50		
					C3		599470.73	741345.76		5.40	2.40	44%	1.99	3.4	-2.70		
093	9/25/2008	598434	743699	16.50	SA		SA	SA	6	SA	SA	SA	SA	SA	SA	SA	Station abandoned after 4 attempts with Little Champ vibracore; no penetration (rocks and cobbles).
094	9/25/2008	598547	743747	16.50	SA		SA	SA	6	SA	SA	SA	SA	SA	SA	SA	Station abandoned after 4 attempts with Little Champ vibracore; no penetration (rocks and cobbles).
095	9/24/2008	596669	746040	17.10	SA		SA	SA	6	SA	SA	SA	SA	SA	SA	SA	Station abandoned after 5 attempts using push core; no penetration (rocks and cobbles).
096	9/24/2008	596784	746212	17.08	C3	x	596780.72	746210.86	6	1.70	1.40	82%	1.42	0.1	0.40	Fine sand w/ organics	Refusal at shallow depth w/ rocky substrate.
					C2		596781.38	746211.52		1.80	1.10	61%	1.04	0.1	0.40		
097	9/22/2008	595533	746798	17.35	SA		SA	SA	6	SA	SA	SA	SA	SA	SA	SA	Station abandoned for safety reasons.
098	10/1/2008	595077	747203	17.45	C1	x	595074.88	747203.34	8	9.10	8.40	91%	7.95	2.3	23.29	Dark gray silt w/ clay and organics	Refusal at 9.1', red-brown sand noted in bottom of core shoe.
					C2		595078.09	747202.48		9.40	8.60	85%	8.09	2.2	23.40		
099	10/1/2008	594943	747037	17.45	C1	x	594943.47	747038.19	8	8.40	7.80	93%	7.36	8.4	17.19	Red brown sand and gravel (7.2')	
					C2		594943.33	747038.85		8.70	7.30	84%	3.87	8.4	17.19		
100	9/30/2008	594601	747934	17.60	C1	x	594727.81	747680.59	8	5.90	3.75	68%	3.20	3.3	22.48	Dark brown silty sand	Refusal at 5.9'.
					C2		594727.78	747679.04		5.60	4.00	71%	3.26	3.3	22.48		
101	10/2/2008	594316	747817	17.45	C1	x	594378.09	747689.88	8	10.00	8.90	89%	8.50	4.4	21.18	Dark brown to black silt w/ clay	
					C2		594378.24	747692.06		5.00	3.50	70%	2.89	4.8	20.78		
102	10/2/2008	594035	747696	17.45	SA		SA	SA	8	SA	SA	SA	SA	SA	SA	SA	Station abandoned due to utilities; original location now a sandbar.
103	9/29/2008	594080	748441	17.80	C1	x	594471.02	748317.05	8	6.00	7.20	120%	7.09	8.0	17.93	Gray-green fine sand	Station location moved 410' east due to shallow water & utilities. Refusal at 6'.
					C2		594472.88	748315.30		5.50	6.50	118%	3.88	8.0	17.89		
104	9/29/2008	594346	751403	18.30	C1	x	594047.34	751437.42	8	9.90	9.60	97%	9.68	2.7	23.20	Dark brown clayey silt	Target location moved 300' south due to utilities, core advanced to limits of equipment. Heavy sheen visible on core liner; C1 void from 0.99'-1.03'.
					C2		594043.44	751438.15		10.00	9.50	95%	7.78	1.9	24.00		

Table 2-2 Sediment Core Collection Summary (Continued)

Location 2008-CLRC-	Core Collection Date	NJ State Plane coordinates (NAD 83 feet)		River Mile	Core ID ¹	Primary Core	NJ State Plane coordinates (NAD 83 feet)		Estimated Target Depth (feet)	Core Penetration (feet)	Core Recovery (feet)	Percent Recovery (%)	Processed Length ² (feet)	Water Depth (feet)	River Bottom Elevation (feet NGVD 29)	Material at Bottom of Core (Depth to red sand or clay/silt)	Comments
		Target Easting	Target Northing				Easting (Actual)	Northing (Actual)									
105	9/18/2008	ND	ND	Saddle R.	C2	x	582603.03	712996.12	3	1.00	0.60	60%	0.50	0.3	NS	Coarse sand and gravel	Push core used to collect C2; stainless steel utensil used to collect C3 in a bucket.
					C3		582607.58	712992.53		0.60	0.60	100%	0.50	0.3	NS		
106	9/22/2008	ND	ND	Second R	C1	x	588602.54	709376.67	3	0.60	0.60	100%	0.50	0.3	NS	Sand and gravel	Sample collected using stainless steel utensil and placed in a bucket.
107	9/22/2008	ND	ND	Second R	C2		588730.81	709365.47	3	0.60	0.60	100%	0.50	1.3	NS	Sand and gravel	Sample collected using stainless steel utensil and placed in a bucket.
108	9/23/2008	ND	ND	Third R.	C1	x	593676.1	726699.07	3	9.00	7.60	84%	3.60	0.5	NS	Gray & red-brown clay (1.3' to 1.5')	
					C2		593675.65	726698.37		9.40	7.30	78%	3.20	0.5	NS		
109	8/21/2008	ND	ND	3rd trib	C3	x	594287.24	724357.77	3	9.00	7.90	88%	7.58	3.1	NS	Red-brown sand w/ little silt (6.5')	
					C2		594285.34	724360.26		5.30	5.10	96%	4.00	2.6	NS		
110	8/25/2008	ND	ND	3rd trib	C1	x	594190.04	724388.40	3	9.40	9.60	102%	9.37	0.8	NS	Red-brown silt (8.5')	C1 void from 4.6'-4.8'.
					C2		594191.62	724390.75		5.00	4.40	88%	3.80	1.4	NS		
111	9/15/2008	ND	ND	Saddle R.	C1	x	604288.16	741238.98	3	9.10	6.80	75%	6.67	0.1	NS	Red fine sand (2.45' to 3.0')	Above HOT; C2 void along side of liner from 4.0'-5.0'.
					C2		604285.94	741238.02		9.20	6.20	67%	6.00	0.1	NS		
					C3		604284.69	741237.45		6.60	3.90	59%	3.70	0.2	NS		
112	9/16/2008	ND	ND	Saddle R.	C2	x	601929.05	739049.26	3	6.90	3.90	57%	3.58	0.9	NS	Gray to black sand w/ gravel	Below HOT; C1 had washout at 1.0' and sediment appeared highly disturbed.
					C3		601927.69	739049.15		7.00	4.10	59%	3.90	1.7	NS		
					C1		601930.68	739049.03		6.50	3.50	54%	3.80	0.4	NS		
113	9/17/2008	ND	ND	Saddle R.	C1	x	601582.62	739065.81	3	3.00	2.10	70%	2.06	0.6	NS	Gray med to coarse sand	Refusal at 5.1' and 11.6'.
					C3		601585.95	739070.1		4.60	3.00	65%	2.80	0.8	NS		
					C5		601584.11	739066.04		11.60	7.70	66%	3.80	0.2	NS		
114	9/18/2008	ND	ND	9.60	C2	x	592677	716751	3	7.60	7.00	92%	6.65	1.3	2.90	Gray med sand	Refusal at 7.4' and 7.6'.
					C1		592670.68	716755.49		7.40	6.50	88%	6.50	1.9	2.70		
					C3		592683.11	716758.1		6.20	6.00	97%	1.95	2.5	1.20		
115	10/27/2008	588403	692312	4.21	C1	x	588401.15	692313.90	10	8.00	8.60	108%	7.91	20.3	-18.20	Red-brown sand and gravel (7.4')	
					C2		588406.98	692314.85		4.70	4.10	87%	3.59	19.6	-18.60		
115D	12/8/2008	588403	692312	4.20	D1	x	588396.22	692309.10	2.5-3.0	2.55	2.55	100%	2.00	17.4	-17.80	Black stained silt ³	D' station location.
116	12/15/2008	ND	ND	Dundee Canal	C1	x	597836.00	743998.00	3	3.50	2.00	57%	1.95	2.7	NS	Dark reddish-gray gravel (1.2')	
					C6		597833.00	744003.00	2.5	2.50	1.30	52%	1.22	3.1	NS		
					C7		597835.00	743999.00	2.5	2.70	1.50	56%	1.40	3.1	NS		
117	NA	ND	ND	Dundee Canal	SA		SA	SA	3	SA	SA	SA	SA	SA	SA	SA	Station abandoned due to access issues, no cores attempted.
118	12/16/2008	ND	ND	Weasel Brook	C1	x	597357.00	739666.00	3	5.00	3.80	76%	3.80	3.1	NS	Red-brown silt (2.0'-3.5')	
					C5		597354.00	739660.00	3	4.80	3.40	71%	3.50	4.9	NS		
					C6		597355.00	739653.00	3	3.00	2.50	83%	2.49	6.4	NS		
					C2		597360.00	739662.00	3	5.00	1.80	36%	1.75	3.4	NS		

Notes:

¹ Primary core is listed first, secondary core next, etc. This column includes all retained cores for processing. All attempted cores are shown in the Sediment Core Collection Records.

² Length of core logged/processed only; additional segments or intervals collected may not have been processed if soil volume was not required.

³ 'D' stations not advanced to native material.

⁴ Estimated Target Depth and Target Easting and Northing (NJ State Plane coordinates) are target values as presented in Appendix A of the QAPP/FSP Addendum (ENSR 2008a).

⁵ Core 1070 is at the same location of 2008-CLRC-070. This core was collected multiple times on multiple days in an attempt to get the surface to settle for processing. It was labeled 1070 due to limitations of the database.

SA - station abandoned.

NA - not applicable, station not attempted.

ND - not determined.

NM = not measured.

NS - not surveyed.

NAD 83 - North American Datum of 1983.

NGVD 29 - National Geodetic Vertical Datum of 1929.

HOT - head of tide.

w/ - with

w/o - without

Table 2-3 Summary of Core Processing

Location 2008-CLRC -	River Mile	Processed Length ¹ (feet)	Number of Sample Intervals Processed	Analyte Group (A,B,C,D)	General Sediment Description and Observations ²	Total VOCs ³ (ppm)	H ₂ S ³ (mg/m ³)	Hg ³ (mg/m ³)	Comments
001	-0.15	18.90	11	A,B,C	Brown silt w/ bands of black staining	0.0	0	0.004	
002	0.00	8.17	7	A*	Black stained silt over sand	0.0	0	0.005	
003	0.22	12.00	9	A*	Brown silt over sand, some black staining	0.0	4	0.012	
004	-0.03	20.15	12	A	Brown silt w/ bands of black staining	4.8	0	0.016	
005	0.15	12.20	8	A	Silt w/ bands of black staining, some staining heavy	0.0	0	0.008	
006	0.35	17.50	11	A	Silt grading to sandy silt, some black staining	0.0	0	0.026	
007	0.41	19.10	12	A,B	Silt over sand, some black staining	0.0	0	0.175	
008	0.37	16.23	11	A	Silt w/ black staining, hydrocarbon-like oil in sand & slag lenses	192.0	0	0.644	C1 D-E segment had elevated total VOC & Hg readings in 'J' and 'K' intervals
009	0.46	14.73	9	A	Silt w/ black staining, some staining heavy	0.0	0	0.006	
010	0.63	24.40	13	A	Silt w/ bands of black staining, heavy staining in lenses	21.2	0	0.035	
011	0.54	20.23	13	A,C	Green-gray silt w/ abundant oyster shells	0.0	2	0.304	
012	0.66	14.33	10	A	Silt w/ some clay, some black staining	0.1	0	0.014	Tops of both A-B segments very liquid, held in cooler overnight to let top settle
013	0.74	15.50	10	A	Dark olive-brown silt w/ some black staining in bands	0.0	0	0.007	
014	1.03	23.18	14	A	Brown to black stained silt grading to clayey silt over sand, tar-like material in seams	0.0	0	0.123	
015	1.11	13.15	10	A,C	Black stained silt w/ fill (slag/gravel) over sand & silt	0.0	0	0.020	
016	1.11	20.25	13	A*	Dark gray to black stained silt, some staining heavy	3.6	0	0.013	
017	1.07	28.55	15	A	Black stained silt, some staining heavy, thin lens of tar-like material	8.1	2	0.025	
018	1.47	13.77	9	A	Silt w/ black staining over interbedded silt & sand	0.0	0	0.009	
019D	1.45	3.26	5	D	Black silt w/ sand	0.5	0	0.058	D' station processed on 12/5/08
019	1.47	5.27	5	A	Organics & silt mix over silt w/ minor black staining	0.0	0	0.022	
020	1.47	11.60	8	A	Brown to black silt	45.7	3	0.114	
021	1.94	11.85	8	A,B	Brown to black silt	18.2	0	0.013	
022D	2.62	3.05	5	D	Brown to black silt w/ some organics	0.8	11	0.999	D' station processed on 12/5/08; elevated Hg & H ₂ S readings on 'B' through 'E' intervals
022	2.64	14.13	10	A	Silt w/ black staining in zones over sand	8.0	208	0.282	Elevated Hg & H2S readings in top 0-3.5' of core (A-B)
023	2.62	15.83	10	A	Brown to black silt	17.4	0	0.012	
024	2.62	12.03	8	A	Black stained silt over silty clay	13.8	0	0.054	
025	2.85	8.77	7	A	Green-gray silt w/ bands of black staining	1.9	0	0.032	
026	3.17	5.98	5	A,B	Silt w/ some black staining over clay	3.2	0	0.012	
027	3.52	14.29	9	A	Brown silt grading to black silty clay	6.7	0	0.024	
028	3.53	9.10	7	A	Brown silt w/ minor black staining	7.5	0	0.004	
028D	3.51	1.97	5	D	Black stained silt w/ little clay, sand, & organics	0.0	0	0.027	D' station processed on 12/10/08
029	3.53	10.01	7	A	Dark brown silt w/ some clay and black staining	12.1	0	0.023	Sample intervals adjusted for voids. Measured length 10.01', adjusted length 9.46'
030	4.25	8.73	7	A	Black stained silt & clayey silt over black sand & gravel layers	2.0	0	0.012	
031	4.25	11.21	6	A	Black stained organics & silt w/ thin oily sand lenses over sand & silt/clay, tar-like material in sand and gravel layers	6.8	0	0.000	C1 'A','B',& 'C' intervals saturated, loose, assume smear zone in samples
032	4.24	12.10	9	A	Black stained silt, hydrocarbon-like oil w/ some heavy staining	NM	0	0.000	
033	5.00	7.65	6	A*	Black stained silt & organics over sand & gravel	0.6	0	0.057	C2 'A' interval mainly liquid, held in cooler overnight
034	5.30	2.70	3	A,B	Black silt w/ sand & organics over gravel, heavy staining in gravel	1.7	0	0.550	Elevated Hg readings in C3 'B' interval
034D	5.30	1.97	5	D	Black silt w/ very fine sand	7.2	55	0.999	D' station processed 12/12/08; elevated Hg and H ₂ S readings in 'C' & 'D' intervals
035	5.51	3.94	2	A*	Red-brown silt w/ very fine sand	0.0	0	0.000	
036	5.51	7.97	7	A	Black stained silt w/ interbedded fine sand over gravel, tar-like material in sand & gravel	0.8	0	0.032	
037	5.51	4.91	5	A	Gray to black silt over sand & gravel	0.1	0	0.019	E' interval mainly gravel
038	6.00	8.40	7	A	Silt interbedded w/ sandy silt, some staining & organics	0.8	0	0.021	Segment length for C1 adjusted for voids, used C2 for 'F' & 'G' intervals
039	6.27	10.40	8	A	Silt, silty sand, clayey silt w/ interbedded organic layers	0.0	0	0.028	
040	6.49	5.30	5	A,B	Black silt over sand	0.0	0	0.006	
041	6.49	4.68	5	A	Alternating layers of brown to black silt & fine sand	0.0	0	0.017	
042	6.50	5.35	5	A	Brown silt w/ few sand layers	NM	NM	0.013	
043	7.00	6.45	5	A*	Silt w/ few sand/gravel layers	0.0	0	0.013	
044	7.00	5.90	5	A,C	Silt w/ sand layers & organics over sand & gravel	0.0	NM	0.000	Not enough red-brown sand to sample
045	7.00	13.00	9	A,B	Brown silt w/ some black staining	7.7	NM	0.017	Used material from grain size jar for Hg sample at C2GS, no smear zone material included in sample.
046	7.45	2.50	2	A*	Thin silt layer over red-brown sand	0.0	NM	0.004	
047	7.45	7.17	6	A*	Dark brown silt layer over sand and silty sand	2.4	0	0.030	

Table 2-3 Summary of Core Processing (Continued)

Location 2008-CLRC -	River Mile	Processed Length ¹ (feet)	Number of Sample Intervals Processed	Analyte Group (A,B,C,D)	General Sediment Description and Observations ²	Total VOCs ³ (ppm)	H ₂ S ³ (mg/m ³)	Hg ³ (mg/m ³)	Comments
047D	7.45	1.97	5	D	Dark brown to black silt and medium sand	0.0	0	0.000	D' station processed on 12/12/08; portions of 'D' & 'E' intervals collected by scooping from cylinder placed inside the core liner due to problems extruding sample
048	7.44	7.30	6	A*	Black silt over dark gray sand then gravel	0.0	0	0.000	
049	7.86	3.68	5	A	Black medium to coarse sand w/ gravel & shell fragments at depth	0.3	0	0.000	C1 processed as primary core; 'E' interval collected from C2
050	7.97	3.24	4	A	Silt and sand over gravel, some black staining and organics	0.1	0	0.010	
051	7.97	1.60	3	A	Thin black silt layer over sand & gravel, some staining	0.0	0	0.000	C1 processed as primary core; 'C' interval collected from C2 & C3
052	7.97	1.14	1	A	Thin silt layer over red-brown gravel & sand	0.0	0	0.000	C2 processed to 0.6' w/o core catcher; C3 processed to 0.7' w/o core catcher
053	8.10	SA	0	A	SA	SA	SA	SA	Station abandoned
054	8.44	4.05	4	A*	Thin silt layer over brown sand & gravel	0.0	0	0.000	
055	8.44	7.70	7	A,B*	Silt & organics layer over sand w/ few clay lenses	0.0	0	0.003	
056	8.98	14.25	10	A*	Alternating layers of silt/clayey silt and sand, some black staining	7.3	0	0.021	
057	8.99	8.40	8	A*	Black stained silt over clay then sand, heavy staining in silt	6.3	0	0.000	VOCs collected from bottom of primary core (C1GS); red sand encountered in secondary core, C2HS collected for limited analyses with no VOCs
058	9.42	9.22	7	A*	Dark gray to black organics & silt over sand	7.1	3	0.888	Elevated Hg readings in 0-1' for C1, C2, & C3
059	9.50	8.12	1	A	Silt & sand over red-brown sand w/ gravel	0.0	0	0.004	A' interval processed as red sand; intervals 'B' - 'F' processed but not submitted to lab, red silt determined to be native material
060	9.57	8.27	7	A	Silt grading to sand w/ depth	2.6	0	0.000	Not enough red-brown sand to sample
061	10.03	6.43	6	A*	Thin layer of silt w/ organics over sand, some crushed coal	0.0	0	0.000	
062	10.02	13.64	9	A*	Silt w/ some black banding over sand w/ little gravel	44.3	0	0.022	
062D	10.00	2.00	5	D	Dark brown to black silt w/ little clay	1.7	0	0.006	D' station processed on 12/12/08
063	10.27	6.35	5	A*	Gray silt over reddish sand then clay	0.0	0	0.005	
064	10.55	3.78	4	A*	Thin organics & silt layer over sand	0.3	0	0.007	
065	10.55	13.83	9	A	Interbedded silt, sandy silt, silty sand layers, some black staining	0.4	0	0.018	
066	10.93	5.77	5	A	Thin organic layer over sand, wood, brick, & shell fragments	1.3	0	0.004	Not enough red-brown sand to sample
067	10.93	6.90	7	A,B*	Black to gray silt over sand	8.5	0	0.004	
068	11.32	8.00	6	A*	Dark gray to black stained silt over silt & sand	0.0	0	0.006	
069	11.51	6.96	6	A*	Black stained silt over sand, some staining heavy w/ sheen	0.0	0	0.004	
070	11.51	7.56	4	A*	Suspended fines (soupy) over sand & silty sand	0.0	0	0.004	Top of A-B segments mainly liquid, placed in cooler overnight to settle, processed B-C segments. Adjusted intervals from B-C after A-B segment settled; A & B samples discarded as investigation-derived waste
070	11.51	DNP	DNP	DNP	DNP	DNP	DNP	DNP	2nd attempt at station 070. Did not process, top sediment never settled
1070 ⁴	11.50	4.02	1	A	Red-brown silt & sand over clayey silt	0.0	0	0.010	3rd attempt at station 070. Material visually different; submitted 'A' interval only
071	11.98	3.45	4	A*	Sand over silt layer then red sand	0.0	0	0.004	
072	12.03	2.42	2	A*	Thin silt layer over sand & gravel/cobbles	0.0	0	0.000	
073	12.30	4.00	4	A,B,C*	Black to brown silt over red-brown sand w/ gravel	0.0	NM	0.006	Top intervals of A-B segments very liquid
074	12.56	8.85	7	A	Dark gray to brown silt grading to clayey silt	0.0	0	0.018	
075	12.56	3.88	3	A*	Thin silt layer over sand, minor black staining	0.0	0	0.000	
076	12.79	3.90	4	A*	Thin layer of organics & silt over sand	0.00	0	0.000	
077	12.84	3.83	5	A*	Dark brown silt w/ few sand & gravel layers	0.0	0	0.000	
078	13.23	8.10	7	A	Alternating sand & silt layers w/ minor black staining & organics	0.1	0	0.008	Not enough red-brown sand to sample
078D	13.23	2.00	5	D	Very fine sand w/ some silt	0.0	0	0.007	D' station processed on 12/12/08
079	13.58	5.87	5	A	Alternating layers of silt & sand, crushed coal in zones	3.5	0	0.012	
080	13.58	5.43	5	A	Dark brown silty sand & sand	2.7	0	0.006	
081	14.09	3.10	4	A	Thin silt layer over sand then gravel & fill, some crushed coal and shells	1.3	0	0.004	
082	14.09	18.90	12	A,B*	Silt w/ interbedded sand, some clay & organics	1.5	0	0.010	
083	14.21	4.14	5	A	Thin silt layer over sand & gravel w/ crushed slag	0.0	0	0.007	
084	14.20	12.35	8	A*	Sand over peat & silty clay over sand & silt	1.3	0	0.007	
085	14.81	16.25	10	A	Silt w/ intebedded very fine sand, some black staining, clayey w/ depth	1975.0	0	0.012	
086	15.07	4.81	5	A	Sand w/ gravel over green-gray clay	0.0	0	0.034	
087	15.07	3.65	4	A	Gray, medium sand	0.0	0	0.022	
088	15.50	3.85	3	A,B	Thin silt layer over sand then red clay w/ some gravel	0.0	0	0.010	

Table 2-3 Summary of Core Processing (Continued)

Location 2008-CLRC -	River Mile	Processed Length ¹ (feet)	Number of Sample Intervals Processed	Analyte Group (A,B,C,D)	General Sediment Description and Observations ²	Total VOCs ³ (ppm)	H ₂ S ³ (mg/m ³)	Hg ³ (mg/m ³)	Comments
089	15.50	5.00	5	A	Thin silt layer over sand & gravel, some black staining, over red clay	0.0	0	0.011	
090	15.63	1.94	2	A	Dark brown to black sand w/ gravel & slag over red clay	0.0	0	0.011	C1BS samples for herbicides & TPH-extractables processed vertically due to short segment w/ core catcher
091	16.00	SA	0	A	SA	SA	SA	SA	Station abandoned, no cores processed
092	16.00	4.20	2	A*	Sand & gravel over red-brown sand & silt	0.0	0	0.008	
093	16.50	SA	0	A	SA	SA	SA	SA	Station abandoned, no cores processed
094	16.50	SA	0	A	SA	SA	SA	SA	Station abandoned, no cores processed
095	17.10	SA	0	A	SA	SA	SA	SA	Station abandoned, no cores processed
096	17.08	1.42	2	A	Fine sand w/ organics, minor black staining	0.0	0	0.011	
097	17.35	SA	0	A	SA	SA	SA	SA	Station abandoned for H&S reasons
098	17.45	7.95	7	A,C	Fill over silt w/ organics & clay, oil-like material in organic layers & seams	0.0	0	0.028	
099	17.45	7.36	6	A	Sand over silt, black staining w/ depth	0.0	0	0.009	Not enough red-brown sand to sample
100	17.60	3.20	4	A,B	Thin silt layer over sand & silt	0.0	0	0.028	
101	17.45	8.50	7	A	Silt w/ some clay, oil-like material in thin sand & organic layers	0.3	0	0.010	
102	17.45	SA	0	A	SA	SA	SA	SA	Station abandoned, no cores processed
103	17.80	7.09	6	A	Silty sand & organic layer over silt grading to silty sand	0.0	0	0.011	Majority of A-B & B-C segments very liquid, assume smear zone in samples; C1 (B-C) majority of 'E' interval processed vertically
104	18.30	9.68	7	A	Silt & organics over clayey silt w/ interbedded organic/sand lenses, black staining & hydrocarbon-like sheen with oily consistency in organic/sand lenses	0.0	0	0.037	
105	Saddle R.	0.50	1	A	Coarse sand & gravel	0.0	0	0.009	
106	Second R	0.50	1	A	Coarse sand & gravel	NM	NM	0.000	
107	Second R	0.50	1	A	Coarse sand & gravel	NM	NM	0.000	
108	Third R.	3.60	2	A	Thin silt layer over sand w/ organics, minor staining	0.0	0	0.007	
109	3rd trib	7.58	6	A*	Silt to silty clay over sand w/ some gravel & cobbles over red-brown sand	0.0	0	0.009	
110	3rd trib	9.37	7	A	Silt over sand w/ organics, interbedded silt & sand	0.7	0	0.013	
111	Saddle R.	6.67	5	A*	Very fine to fine sand	0.0	0	0.000	
112	Saddle R.	3.58	4	A	Thin silt layer over sand, some organic layers, gravel & cobbles	0.0	0	0.010	
113	Saddle R.	2.06	3	A	Sand w/ organic layers	0.0	0	0.012	
114	9.60	6.65	6	A	Organics over sand w/ silt, then interbedded green-gray silt & sand	0.0	0	0.008	C3 processed for A interval only
115	4.21	7.91	7	A*	Black stained silt w/ sand lenses, clayey, heavy sheen in red sand & gravel at bottom	12.4	0	0.030	
115D	4.20	2.00	5	D	Silt layer over crushed shells & sand then black-stained silt	2.1	0	0.008	D' station processed on 12/11/08
116	Dundee Canal	1.95	1	A	Thin silt layer over gravel	0.0	0	0.006	No samples collected for analysis from cores, primarily gravel mix
117	Dundee Canal	SA	0	A	SA	SA	SA	SA	Station abandoned, no cores processed
118	Weasel Brook	3.80	4	A*	Sand w/ gravel grading to silt, minor black staining	0.0	0	0.004	

Notes:

¹ Length of core logged/processed only; additional segments collected may not have been processed for secondary cores if soil volume not required.

² Sediment descriptions are generalized over the length of the core and incorporating primary and secondary cores, refer to the Lithology Records (**Appendix K**) for specific soil classifications, observations, and depths.

³ Maximum reading per station during vapor screening of sediment.

⁴ Core 1070 is at the same location of 2008-CLRC-070. This core was collected multiple times on multiple days in an attempt to get the surface to settle for processing. It was labeled 1070 due to limitations of the database.

* - bottom sample processed as "red sand" and submitted for limited analyses

DNP - did not process.

NA - not applicable.

NM - not measured, meter not working properly.

SA - station abandoned.

ND - not determined, 'D' stations not advanced to parent material.

ppm - parts per million.

mg/m³ - milligrams per cubic meter.

VOC - volatile organic compound.

H₂S - hydrogen sulfide.

Hg - mercury.

Table 2-4 Selected Analytes by Location which were Not Submitted for Analysis Due to Limited Sample Volume

Location 2008- CLRC-	Analytes
008	Samples for metals/butyltins/CN/TOC, herbicides, TPH-extractables, and grain size not collected for C1KS.
009	Samples for herbicides and TPH-extractables not collected for C3IS.
011	Samples for SVOCs, metals/butyltins/CN/TOC, herbicides, and TPH-extractables not collected at C1MS.
012	Samples for metals/butyltins/CN/TOC, herbicides, and TPH-extractables not collected for C1JS.
024	Samples for metals/butyltins/CN/TOC not collected for C1HS.
030	Sample for TPH-extractables not collected for C1GS.
033	Samples for SVOCs, metals/butyltins/CN/TOC, herbicides, TPH-extractables, and grain size not collected for C1ES.
036	Samples for SVOCs, metals/butyltins/CN/TOC, herbicides, TPH-extractables, and grain size not collected for C2GS.
040	Samples for metals/butyltins/CN/TOC, herbicides, TPH-extractables, and grain size not collected for C1DS. Samples for VOCs, EqP, sulfide, and Cu/Ni, TPH-purgeables, methyl mercury, AVS/SEM, and Cr(VI) were not collected from the grab samples at this station.
043	Samples for VOCs, EqP, sulfide, and Cu/Ni not collected from the grab samples.
046	Samples for herbicides, TPH-extractables, and grain size not collected for C2AS.
050	Samples for SVOCs, metals/butyltins/CN/TOC, herbicides, and TPH-extractables not collected for C1DS.
055	Samples for VOCs, EqP, sulfide, and Cu/Ni, TPH-purgeables, methyl mercury, AVS/SEM, and Cr(VI) were not collected from the grab samples at this station.
077	Samples for metals/butyltins/CN/TOC, herbicides, TPH-extractables, and grain size not collected for C2DS.
083	Sample for TPH-extractables not collected for C1ES.
085	Samples for metals/butyltins/CN/TOC, herbicides, and TPH-extractables not collected for C1JS.
089	Samples for VOCs, EqP, sulfide, and Cu/Ni not collected from the grab samples.
101	Samples for herbicides and TPH-extractables not collected for C1GS.
111	Samples for PCB congeners, PCB Aroclors, pesticides (HRGC/HRMS and GC/ECD), mercury, SVOCs, metals/butyltins/CN/TOC, PAHs, herbicides, TPH-extractables, and grain size not collected for C1DS.
116	Samples collected from cores C1, C6, and C7 consisted primarily of a gravel mix, samples were not submitted for analysis of Group A analytes as proposed.
118	Samples for VOCs, EqP, sulfide, and Cu/Ni not collected from the grab samples.

Note: Not included are abandoned stations for cores (refer to **Table 2-7**) or locations at which grab samples could not be collected: 2008-CLRC-019, -031, -035, -046, -050, -052, -054, -061, -070, -072, -087, -088, -090, -092, -106, -107 (see **Table 2-8** for further details).

Table 2-5 Bridges Within the LPRSA

Bridge Name	RM	Structure Type
Dismantled Bridge	0.91	Dismantled
Lincoln Highway Bridge	1.57	Lift Deck
Pulaski Skyway Bridge	1.75	Fixed Span
Point-No-Point Bridge	2.33	Swing
I95 Bridge	2.41	Fixed Span
Jackson Street Bridge	4.37	Swing
Amtrak Bridge	4.75	Lift Deck
Bridge Street Bridge	5.41	Swing
(Newark- Harrison) Erie Swing Bridge	5.57	Swing
I-280 Stickle Bridge	5.61	Lift Deck
Clay Street Bridge	5.83	Swing
Fourth Avenue Bridge	6.07	Single Leaf Truss Bascule (fixed open)
West Arlington Street Bridge	7.81	Fixed Rail (decommissioned swing)
Rutgers (Rte 7) Bridge	8.53	Lift Deck
DeJesse-Avondale Street (Kingsland Avenue) Bridge	10.37*	Opening Truss Swing
Lyndhurst-Delaware Rail Bridge	11.40	Opening Swing
Rutherford Avenue (Rte 3) Bridge	11.65	Double Leaf Bascule
Union Avenue Bridge	12.98	Fixed Span
Main Street Bridge	13.98	Fixed Truss
Wallington Street Bridge	14.40	Fixed Span
West 8th Street Bridge	14.96	Fixed Rail (decommissioned)
Garfield-Wall Street Bridge	15.73	Fixed Span
Monroe Street Bridge	16.04	Fixed Span
Railroad Bridge	16.06	Fixed Rail

* RM not surveyed, 10.37 is the planned location.

Table 2-6 Non-Hazardous Waste Shipment Summary (55-gallon Steel Drums)

Date	CVCC Bill of Lading Number	Non-Hazardous Solid – PPE/ Plastic	Non-Hazardous Solid – Sediment	Non-Hazardous Liquid
9/26/2008	092093	13	9	0
9/26/2008	092094	0	0	18
11/14/2008	092076	14	1	0
1/23/2009	092055	0	0	20
3/20/2009	115031	24	0	0
3/20/2009	115026	24	0	0
3/23/2009	115030	24	0	0
3/23/2009	115036	0	18	0
4/08/2009	092042	0	0	17
4/08/2009	092043	1	0	0
4/24/2009	092037	0	6	0
5/01/2009	003533598JJJ	2	0	0
Drum Totals		102	34	55

Table 2-7 Locations Abandoned for Sediment Core Sampling

Location 2008-CLRC-	Reason for Abandonment
053	Abandoned after five coring attempts (three on-target, one upriver, one downriver); rocky substrate; penetration 0.5 feet
091	Abandoned after four attempts with portable vibracore (three on-target, one downriver); rocky substrate and boulders; no penetration
093	Abandoned after four attempts with portable vibracore (three on-target, one downriver); no penetration
094	Abandoned after four attempts with portable vibracore (three on-target, one downriver); no penetration
095	Abandoned after five attempts with push core (three on-target, one upriver, one downriver); cobbles and boulders; no penetration and no recovery
097	Abandoned due to safety reasons (work immediately downstream of Dundee Dam); no cores attempted
102	Abandoned due to shallow conditions (location now a sandbar) and safety concerns (utilities); no cores attempted
117	Abandoned due to property owner not granting access (Dundee Canal location); no cores attempted

Table 2-8 Surface Grab Sample Collection Summary

Location 2008-CLRC -	Collection Date	River Mile	Grab Sample ID ¹	Easting (NJ State Plane NAD 83-feet)	Northing (NJ State Plane NAD 83- feet)	Grab Recovery (inches)	Redox Depth (inches)	Water Depth (feet)	River Bottom Elevation (feet NGVD 29)	Salinity Screening Results ² (parts/ thousand)	General Descripton of Material in Surface Grab Samples	Comments
001	11/20/2008	-0.15	G1	597301.96	682658.63	8	0	24.1	-24.8	NM-w	Brown silt	B' analytes collected from grab samples
			G2	597303.97	682665.47	8	0	24.3	-24.9	NM ³		
			G3	597297.83	682663.79	8	0	24.4	-24.8	20		
002	11/11/2008	0.00	G1	598283.12	683952.02	6	0	13.8	-12.4	20	Brown sand	
			G2	598291.89	683949.66	8	0	13.8	-12.5	20		
003	11/11/2008	0.22	G1	599314.41	685712.00	8	0	4.4	-5.4	18	Brown-green silt & sand	
			G2	599305.99	685717.17	8	0	3.7	-4.9	19		
004	11/25/2008	-0.03	G1	597081.09	683258.54	8	0	21.9	-20.4	NM-t	Brown silt	
			G2	597075.53	683261.01	8	0	21.3	-19.9	14		
005	11/12/2008	0.15	G1	596962.24	684206.92	8	1	21.5	-23.5	16	Black silt	
			G2	596970.40	684211.95	8	1	21.4	-23.5	15		
006	11/18/2008	0.35	G1	597590.50	685645.90	8	0.1	6.2	-3.3	14	Black silt	
			G2	597585.84	685645.56	8	0.1	6.3	-3.3	14		
007	11/19/2008	0.41	G1	598062.00	686019.55	8	0	6.5	-2.9	16	Brown to black silt	B' analytes collected from grab samples
			G2	598068.02	686023.61	8	2	6.8	-3.2	15		
			G3	598069.01	686029.08	8	1.2	6.7	-3.1	NM ³		
008	11/24/2008	0.37	G1	596608.87	685402.41	8	0	17.0	-17.6	20	Brown silt	
			G2	596612.30	685399.16	8	0	17.4	-18.2	0 ⁴		
009	11/10/2008	0.46	G1	596734.83	686119.36	8	0.3	22.3	-23.7	NM-t	Black silt	
			G2	596745.91	686117.49	8	0.3	22.2	-23.6	NM-t		
010	12/8/2008	0.63	G1	596984.12	687010.14	8	0.1	12.5	-14.5	20	Black silt	
			G2	596982.15	687012.95	8	0.1	12.6	-14.7	20		
011	11/13/2008	0.54	G1	597910.97	686692.54	8	0	7.6	-2.7	14	Brown silt	
			G2	597906.96	686692.60	8	0	7.4	-2.5	15		
012	12/4/2008	0.66	G1	596650.09	687120.88	8	1	14.2	-14.0	20	Black silt	
			G2	596653.25	687124.42	8	1	14.7	-14.3	NR		
013	11/17/2008	0.74	G1	596894.81	687632.18	8	0.15	21.9	-19.4	20	Black silt	
			G2	596899.65	687632.77	8	0.15	22.2	-19.5	18		
014	12/3/2008	1.03	G1	597612.98	689066.69	8	1.5	9.9	-7.6	NM-t	Black silt	
			G2	597606.72	689065.24	8	1	10.7	-8.3	NM-t		
015	11/12/2008	1.11	G1	597190.27	689653.32	8	0.4	5.7	-1.4	11	Black silt	
			G2	597192.17	689650.20	8	0.4	5.8	-1.6	12		
016	12/1/2008	1.11	G1	597444.68	689554.22	8	0.1	20.6	-16.9	20	Black silt	
			G2	597438.04	689561.52	7	0.1	21.0	-17.1	20		
017	12/2/2008	1.07	G1	597663.91	689288.18	8	0.2	10.4	-7.9	17	Black silt	
			G2	597668.39	689285.07	8	0.2	10.3	-7.7	17		
018	11/10/2008	1.47	G1	597704.47	691423.88	8	0.3	7.3	-5.8	16	Black silt	
			G2	597697.24	691423.85	8	0.3	6.8	-5.5	16		
019	9/24/2008	1.45	NA	NA	NA	0	NA	NA	NA	NA	NA	Leaves & sticks in jaws; grabs abandoned after 6 attempts
020	11/4/2008	1.47	G1	598207.36	691324.59	8	0.2	5.5	-4.1	12	Brown-green silt w/ black organics	
			G2	598206.77	691319.28	8	0.2	5.6	-4.1	11		

Table 2-8 Surface Grab Sample Collection Summary (Continued)

Location 2008-CLRC -	Collection Date	River Mile	Grab Sample ID ¹	Easting (NJ State Plane NAD 83-feet)	Northing (NJ State Plane NAD 83- feet)	Grab Recovery (inches)	Redox Depth (inches)	Water Depth (feet)	River Bottom Elevation (feet NGVD 29)	Salinity Screening Results ² (parts/ thousand)	General Descripton of Material in Surface Grab Samples	Comments
021	11/6/2008	1.94	G3	598320.46	693860.25	8	0	26.2	-25.2	NM-w	Brown silt & sand w/ organics	B' analytes collected from grab samples
			G4	598320.01	693854.71	8	0	26.1	-25.1	NM ³		
			G5	598320.84	693850.71	8	0	26.0	-25.0	NM-w		
022	11/3/2008	2.64	G1	595454.44	695203.14	8	0.3	2.6	0.6	7	Brown-green silt w/ black organics	
			G2	595457.10	695198.32	8	0.3	2.6	0.6	9		
023	11/5/2008	2.62	G1	595564.66	695462.26	8	0.1	12.5	-9.7	12	Brown-green to black silt w/ organics	
			G2	595564.59	695453.10	8	0.1	12.2	-9.3	12		
024	10/30/2008	2.62	G2	595558.70	695767.56	8	0.4	17.0	-13.4	NM-w	Gray-green silt	
			G3	595554.19	695767.24	8	0.4	17.3	-13.6	NM-w		
025	11/3/2008	2.85	G1	594362.58	695472.58	8	0.5	18.4	-15.8	NM-w	Brown-green silt w/ black organics	
			G2	594359.70	695473.98	8	0.3	18.6	-15.8	NM-w		
026	10/29/2009	3.17	G1	592598.65	695422.65	8	0.3	0.6	-0.9	NM-w	Gray-green silt	B' analytes collected from grab samples
			G2	592607.92	695424.39	8	0.2	0.3	-0.8	NM ³		
			G3	592603.92	695429.63	8	0.2	0.0	-0.7	NM-w		
027	10/29/2008	3.52	G1	591243.81	694158.14	8	0.2	11.0	-10.3	NM-w	Dark gray-green organic silt	
			G2	591241.44	694151.83	8	0.2	10.7	-10.3	NM-w		
028	11/5/2008	3.52	G1	591153.91	694217.72	8	0.2	15.6	-15.2	11	Brown-green silt w/ black organics	
			G2	591156.21	694212.44	8	0.2	15.6	-15.1	12		
029	10/29/2008	3.52	G1	591044.69	694265.16	9	0.1	18.8	-16.3	15	Dark gray-green organic silt	
			G2	591045.84	694268.88	8	0.1	18.7	-16.2	13		
030	10/27/2008	4.25	G1	588240.79	692267.90	7	0	19.5	-15.9	NM-w	Dark gray-green silt	
			G2	588241.71	692271.71	8	0	19.2	-15.9	NM-w		
031	10/23/2008	4.25	NA	NA	NA	0	NA	NA	NA	NA	NA	Leaves & sticks recovered, no sediment; grabs abandoned after 6 attempts
032	10/23/2008	4.25	G1	588221.82	692544.40	8	0	12.5	-12.4	NR	Lt gray-green silt	
			G2	588219.22	692541.43	8	0	13.0	-12.7	NR		
033	10/22/2008	5.00	G1	585382.98	694446.03	8	0	15.8	-15.7	11	Gray silt	
			G2	585380.22	694439.87	8	0	16.1	-15.7	11		
034	10/22/2008	5.30	G1	584860.48	695961.38	8	0.1	16.1	-17.5	11	Gray-green silt & sand w/ organics	B' analytes collected from grab samples
			G2	584859.34	695958.30	8	0.1	16.0	-17.5	NM ³		
			G3	584861.26	695966.71	8	7	16.0	-17.7	10		
035	9/23/2008	5.50	NA	NA	NA	0	NA	NA	NA	NA	NA	Grabs abandoned after 6 attempts
036	10/21/2008	5.51	G1	584573.85	697030.20	6	0.3	17.7	-13.7	10	Dark gray silt	
			G2	584572.16	697024.73	8	0.3	17.1	-13.0	11		
037	10/20/2008	5.51	G1	584806.10	697063.46	6	0.2	20.6	-15.5	11	Dark gray silt	
			G2	584811.55	697062.81	6	0.2	20.6	-15.5	11		
038	10/21/2008	6.00	G1	585061.38	699604.47	8	0	15.3	-14.7	7	Dark gray silt & sand w/ organics	
			G2	585063.11	699605.72	8	0	15.7	-14.7	8		

Table 2-8 Surface Grab Sample Collection Summary (Continued)

Location 2008-CLRC -	Collection Date	River Mile	Grab Sample ID ¹	Easting (NJ State Plane NAD 83-feet)	Northing (NJ State Plane NAD 83- feet)	Grab Recovery (inches)	Redox Depth (inches)	Water Depth (feet)	River Bottom Elevation (feet NGVD 29)	Salinity Screening Results ² (parts/ thousand)	General Descripton of Material in Surface Grab Samples	Comments
039	10/20/2008	6.27	G1	585247.84	701014.71	7	0	13.4	-9.4	8	Brown silt & sand	
			G2	585248.27	701010.45	7	0	13.3	-9.5	7		
040	9/24/2008	6.50	G2	585514.12	702189.83	8	0	18.5	-17.0	6	Dark gray-green silt	Only one grab sample collected on 7 attempts; debris in jaws; B' analytes were not collected due to no recovery in other grab attempts
041	9/22/2008	6.49	G2	585599.43	702130.82	6	0	15.2	-16.0	NM-w	Dark gray-green silt w/ organics	
			G3	585606.21	702132.29	9	0	15.4	-15.9	3		
042	9/22/2008	6.50	G1	585646.26	702120.61	9	0	16.8	-15.0	1	Dark gray-green silt w/ organics	
			G2	585642.78	702123.74	8	0	17.2	-15.1	NM-w		
043	8/19/2008	7.00	G8	586916.72	704433.78	12	0	12.6	-8.8	NR	Dark gray-green silt	Only one grab sample collected on 8 attempts; debris in jaws
044	8/19/2008	7.00	G1	587064.54	704367.17	9	0	17.8	-17.1	2	Light gray-green silt w/ organics on top	
			G2	587062.32	704370.20	9	4	17.2	-16.8	2		
045	8/20/2008	7.00	G1	587163.51	704315.64	8	0	8.8	-6.2	NM-t	Light gray-green silt	B' analytes collected from grab samples
			G2	587165.09	704312.51	9	6	8.2	-5.3	NM ³		
			G3	587165.19	704309.03	9	3	7.6	-4.0	NM-t		
046	8/20/2008	7.45	NA	NA	NA	0	NA	NA	NA	NA	NA	Debris in jaws; grabs abandoned after 6 attempts
047	7/30/2008	7.45	G1	587829.54	706609.35	9	4	12.3	-13.8	6	Dark gray silt & sand (G1) and olive silt (G2)	
			G2	587828.98	706607.70	9	0	12.1	-13.8	6		
048	7/31/2008	7.44	G1	587985.20	706485.27	7	0	2.2	-2.0	5	Dark gray silt	
			G2	587986.18	706480.29	9	0	1.9	-2.0	5		
049	8/6/2008	7.86	G1	589179.65	708322.68	7	0	11.6	-11.5	NM-w	Brown-tan sand	Small shrimp in overlying water
			G3	589183.60	708329.31	6	0	12.4	-11.5	1		
050	9/3/2008	7.97	NA	NA	NA	0	NA	NA	NA	NA	NA	Debris and leaves in jaws; grabs abandoned after 6 attempts
051	8/26/2008	7.95	G1	589467.71	708766.03	9	0	11.9	-12.6	NM-w	Light gray sand	
			G2	589468.27	708762.65	9	0	11.9	-12.7	NM-w		
052	8/26/2008	7.95	NA	NA	NA	NA	NA	NA	NA	NA	NA	Grabs not attempted due to hard substrate
053	8/27/2008	8.1	SA	SA	SA	SA	SA	SA	SA	SA	SA	Grabs not attempted due to station abandonment
054	8/27/2008	8.45	NA	NA	NA	0	NA	NA	NA	NA	NA	Debris and rocks in jaws; grabs abandoned after 7 attempts

Table 2-8 Surface Grab Sample Collection Summary (Continued)

Location 2008-CLRC -	Collection Date	River Mile	Grab Sample ID ¹	Easting (NJ State Plane NAD 83-feet)	Northing (NJ State Plane NAD 83- feet)	Grab Recovery (inches)	Redox Depth (inches)	Water Depth (feet)	River Bottom Elevation (feet NGVD 29)	Salinity Screening Results ² (parts/ thousand)	General Description of Material in Surface Grab Samples	Comments
055	8/7/2008	8.44	G4	589668.45	711230.17	7.5	2	11.7	-10.2	NR	Dark gray-green silt over charcoal colored sandy silt w/ organics	Only one grab sample collected on 8 attempts; debris in jaws and washout; B' analytes were not collected due to no recovery in other grab attempts
056	8/27/2008	8.98	G5	590947.99	713734.60	6	0	15.4	-16.1	3	Gray/brown-green silt w/ organics	
			G6	590953.14	713737.26	8	0	15.3	-15.8	3		
057	8/4/2008	8.99	G1	591112.19	713653.44	9	0	5.2	-1.7	1	Dark olive-green silt	
			G2	591108.07	713653.34	9	0	5.6	-1.9	2		
058	8/11/2008	9.42	G1	592067.82	715761.56	6	3	7.7	-8.0	2	Light gray-green silt w/ organics on top	Sulfur-like odor and slight sheen observed
			G4	592076.65	715757.90	6	0	10.3	-9.9	1		
059	8/12/2008	9.5	G6	592248.21	716135.83	6	6	14.4	-15.0	2	Light gray-olive silt over gray sand	
			G8	592245.06	716139.40	6	4	14.6	-15.1	2		
060	8/6/2008	9.57	G1	592486.98	716446.78	6	1.5	3.5	0.3	3	Light gray-green to brown-green silt	
			G2	592480.88	716445.38	9	2-3	3.6	0.3	3		
061	9/3/2008	10.00	NA	NA	NA	0	NA	NA	NA	NA	NA	Debris and sticks in jaws; grabs abandoned after 6 attempts
062	8/13/2008	10.02	G1	592095.26	718736.53	9	0	7.0	-5.2	3	Gray-green to dark gray silt	
			G2	592093.46	718737.05	9	0	7.0	-5.4	2		
063	8/12/2008	10.27	G3	592079.42	720033.87	9	0	12.9	-11.4	NM-t	Gray-green to dark gray silt	
			G4	592083.55	720033.40	9	0	13.9	-12.1	NM-t		
064	8/25/2008	10.55	G9	592234.07	721500.56	8	1.5	13.7	-14.6	0	Gray-green-brown sand & silt	
			G10	592233.33	721507.16	9	0	14.5	-14.7	0		
065	8/28/2008	10.55	G1	592388.43	721474.82	8	0	3.2	-1.5	NM-w	Gray-green silt	
			G2	592385.81	721476.25	8	0	3.1	-1.5	NM-t		
066	8/21/2008	10.93	G1	593076.77	723326.93	8	0	10.6	-11.5	NM-w	Brown to gray-brown sand w/ debris on top	
			G2	593076.48	723331.93	8	0	11.4	-11.7	0		
067	8/5/2008	10.93	G1	593177.75	723183.38	6	0	4.5	-1.0	1	Dark gray-green silt	B' analytes collected from grab samples
			G2	593172.99	723185.35	6	0	5.0	-1.2	NM ³		
			G3	593174.25	723180.74	6	0	5.2	-1.1	1		
068	9/4/2008	11.32	G4	595003.18	724009.18	9	0	12.0	-10.7	NM-t	Light gray-green silt, very liquid	
			G6	594995.83	724011.21	9	0	12.0	-10.1	0		
069	9/4/2008	11.51	G1	595819.59	724486.79	9	0	13.0	-9.2	0	Light gray-green silt	
			G3	595823.50	724485.02	9	0	13.1	-9.4	1		
070	9/2/2008	11.50	NA	NA	NA	0	NA	NA	NA	NA	NA	Grab samples abandoned after 6 attempts
071	8/14/2008	11.98	G4	596750.00	726684.07	7	1	16.4	-14.1	1	Gray-brown sand	
			G5	596752.74	726686.61	7	1	16.2	-14.1	1		

Table 2-8 Surface Grab Sample Collection Summary (Continued)

Location 2008-CLRC -	Collection Date	River Mile	Grab Sample ID ¹	Easting (NJ State Plane NAD 83-feet)	Northing (NJ State Plane NAD 83- feet)	Grab Recovery (inches)	Redox Depth (inches)	Water Depth (feet)	River Bottom Elevation (feet NGVD 29)	Salinity Screening Results ² (parts/ thousand)	General Description of Material in Surface Grab Samples	Comments
072	8/18/2008	11.95	NA	NA	NA	0	NA	NA	NA	NA	NA	Grab samples not attempted due to hard substrate
073	8/14/2008	12.3	G4	596915.70	728363.67	9	0	8.4	-9.3	NR	Gray-green silt	B' analytes collected from grab samples
			G5	596920.67	728360.37	9	0	8.6	-9.5	NM ³		
			G7	596908.89	728364.03	9	0	6.6	-7.7	NR		
074	8/18/2008	12.56	G1	596407.59	729622.62	9	0	8.8	-5.3	0	Gray-green silt	
			G2	596407.57	729619.40	9	0	8.0	-4.5	0		
075	8/18/2008	12.56	G1	596519.51	729653.92	7	3	18.5	-15.4	0	Light gray-green silt & sand	
			G3	596524.65	729661.17	8	3	17.7	-15.7	0		
076	9/8/2008	12.79	G3	600691.81	739254.09	8	0	16.0	-17.2	1	Dark gray-green silt & sand w/ organics on top	
			G4	596099.60	730770.57	8	0	16.0	-14.9	0		
077	9/8/2008	12.84	G2	596226.36	731018.59	9	0	15.5	-12.9	NM-w	Light green silt	
			G3	596221.75	731020.33	9	0	16.6	-14.1	NM-w		
078	9/2/2008	13.23	G2	596795.39	732963.37	8	0	13.5	-13.2	1	Light gray-green sand & silt	
			G4	596804.66	732965.55	7	0	13.0	-13.0	1		
079	9/9/2008	13.58	G2	597257.21	734734.92	6	0	13.3	-11.0	NR	Dark gray sand & gravel w/ shell fragments & organics	
			G3	597255.88	734733.57	8	0	13.7	-11.4	NR		
080	9/10/2008	13.59	G1	597374.31	734717.92	7	0	14.0	-14.0	0	Dark gray-green silt, sand, & gravel	
			G2	597368.02	734713.81	NR	0	13.6	-13.7	0		
081	9/10/2008	14.09	G1	597334.58	737367.40	8	0	15.8	-16.1	NR	Brown sand	
			G4	597332.15	737371.48	8	0	16.3	-16.3	NR		
082	12/10/2008	14.09	G1	597454.77	737358.29	6	0	0.0	0.0	0	Dark gray silt & sand	B' analytes collected from grab samples
			G2	597452.46	737357.71	6	0	0.0	-0.2	NM ³		
			G3	597455.08	737360.01	6	0	0.0	-0.2	0		
083	9/11/2008	14.21	G2	597459.38	737979.88	8	0	16.0	-16.3	NM-w	Brown sand & gravel w/ glass shards	
			G3	597458.93	737984.24	8	0	15.0	-15.5	NM-w		
084	12/9/2008	14.22	G1	597568.51	737985.60	6	0	2.1	-2.5	NR	Dark gray sand w/ organics	
			G2	597569.43	737989.07	6	0	1.9	-2.3	NR		
085	12/11/2008	14.81	NA	NA	NA	0	NA	NA	NA	NA	NA	Leaves & sticks recovered, no sediment; grabs abandoned after 6 attempts
086	9/16/2008	15.07	G2	600472.67	737113.18	8	0	10.8	-8.6	1	Brown sand w/ organics on top	
			G4	600460.85	737119.44	8	0	10.6	-8.5	NR		
087	9/16/2008	15.10	NA	NA	NA	0	NA	NA	NA	NA	NA	Grab samples abandoned after 6 attempts
088	9/17/2008	15.50	NA	NA	NA	0	NA	NA	NA	NA	NA	Rocks in jaws; grab samples abandoned after 6 attempts

Table 2-8 Surface Grab Sample Collection Summary (Continued)

Location 2008-CLRC -	Collection Date	River Mile	Grab Sample ID ¹	Easting (NJ State Plane NAD 83-feet)	Northing (NJ State Plane NAD 83- feet)	Grab Recovery (inches)	Redox Depth (inches)	Water Depth (feet)	River Bottom Elevation (feet NGVD 29)	Salinity Screening Results ² (parts/ thousand)	General Description of Material in Surface Grab Samples	Comments
089	9/17/2008	15.50	G2	600859.49	739271.88	8	0	3.2	-3.7	NR	Brown sand w/ shell fragments in top layer	Only one grab sample collected on 6 attempts; rocks in jaws
090	9/11/2008	15.64	NA	NA	NA	0	NA	NA	NA	NA	NA	Grab samples abandoned after 6 attempts
091	9/25/2008	16.00	SA	SA	SA	SA	SA	SA	SA	SA	SA	Grabs not attempted due to station abandonment
092	9/25/2008	16.00	NA	NA	NA	0	NA	NA	NA	NA	NA	Rocks & cobbles; grab samples abandoned after 6 attempts
093	9/25/2008	16.50	SA	SA	SA	SA	SA	SA	SA	SA	SA	Grabs not attempted due to station abandonment
094	9/25/2008	16.50	SA	SA	SA	SA	SA	SA	SA	SA	SA	Grabs not attempted due to station abandonment
095	9/24/2008	17.10	SA	SA	SA	SA	SA	SA	SA	SA	SA	Grabs not attempted due to station abandonment
096	9/24/2008	17.08	G1	596781.16	746213.64	6	0	0.1	0.2	1	Brown silt & sand w/ organics	
			G2	596780.33	746212.81	6	0	0.3	-0.1	0		
097	9/22/2008	17.35	SA	SA	SA	SA	SA	SA	SA	SA	SA	Grabs not attempted due to station abandonment based on H&S issues
098	10/1/2008	17.46	G1	595080.52	747203.95	7	0.2	2.3	23.3	0	Dark gray silt & sand, green hair-like fibers	
			G3	595083.93	747204.70	8	0.2	2.7	22.9	0		
099	10/1/2008	17.47	G2	594944.12	747040.19	7	0.2	8.6	17.0	0	Dark gray silt & sand	
			G3	594944.64	747039.23	7	0.2	8.7	16.9	1		
100	9/30/2008	17.59	G1	594728.64	747676.78	7	0.1	3.3	22.5	0	Dark gray sand	B' analytes collected from grab samples
			G2	594727.38	747677.03	8	0	3.3	22.5	NM ³		
			G3	594727.14	747677.65	8	0	3.3	22.5	0		
101	10/2/2008	17.61	G1	594376.22	747691.76	8	0.3	4.9	20.7	NR	Dark gray silt w/ abundant organics	
			G2	594378.96	747691.16	9	0.3	5.0	20.6	NR		
102	10/2/2008	17.45	SA	SA	SA	SA	SA	SA	SA	SA	SA	Grabs not attempted due to station abandonment based on safety issues/utilities
103	9/30/2008	17.73	G1	594474.65	748316.66	7	0.2	8.1	17.7	0	Dark gray silt & sand	
			G2	594475.92	748317.66	7	0.2	8.3	17.5	0		
104	9/29/2008	18.37	G1	594046.94	751438.95	7	0	1.5	24.4	1	Dark gray silt & sand w/ organic debris	
			G2	594047.00	751439.07	8	0	1.6	24.3	1		
105	9/18/2008	Saddle R.	G1	582595.05	712996.60	6	0	0.8	NS	NM-w	Brown sand & gravel w/ glass shards	
			G2	582595.08	712990.09	6	0	0.7	NS	NM-w		
106	9/22/2008	Second R	NA	NA	NA	0	NA	NA	NA	NA	NA	Grab samples not attempted, river bottom rocks & cobble

Table 2-8 Surface Grab Sample Collection Summary (Continued)

Location 2008-CLRC -	Collection Date	River Mile	Grab Sample ID ¹	Easting (NJ State Plane NAD 83-feet)	Northing (NJ State Plane NAD 83- feet)	Grab Recovery (inches)	Redox Depth (inches)	Water Depth (feet)	River Bottom Elevation (feet NGVD 29)	Salinity Screening Results ² (parts/ thousand)	General Descripton of Material in Surface Grab Samples	Comments
107	9/22/2008	Second R	NA	NA	NA	0	NA	NA	NA	NA	NA	No grab samples collected; large rock in sampler jaws
108	9/23/2008	Third R.	G1	593675.06	726703.09	6	0	0.4	NS	0	Brown sand w/ leaves on top	
			G2	593673.30	726701.04	6	0	0.4	NS	0		
109	8/21/2008	3rd trib	G5	594277.56	724360.81	7	0	4.0	NS	0	Gray silt & sand w/ organics on top	Sheen noted on G5
			G7	594281.31	724363.33	6	0	3.4	NS	NM-w		
110	8/25/2008	3rd trib	G1	594190.55	724393.02	7	0	2.0	NS	NR	Light gray-green silt	
			G2	594187.92	724394.59	7	0	2.0	NS	NR		
111	9/15/2008	Saddle R.	G1	604283.49	741238.02	8	NR	0.1	NS	NM-w	Brown sand w/ some gravel	
			G3	604282.84	741238.58	6	NR	0.1	NS	NR		
			G4	604283.04	741238.56	6	NR	0.1	NS	NM-w		
112	9/16/2008	Saddle R.	G3	601932.64	739048.94	6	0	1.0	NS	0	Brown sand	
			G4	601932.06	739049.08	6	0	0.8	NS	0		
113	9/17/2008	Saddle R.	G1	601583.20	739063.39	6	0	0.4	NS	NM-w	Brown sand w/ organics on top	
			G2	601580.75	739059.01	6	0	0.3	NS	NM-w		
114	9/18/2008	9.60	G1	592684.78	716749.70	6	0	1.8	1.1	NR	Dark brown sand, rocks/ gravel, and wood debris	
			G4	592686.25	716753.55	6	0	1.4	1.2	NR		
115	10/27/2008	4.21	G1	588404.86	692307.52	8	0.1	19.2	-18.7	NM-w	Brown to black organic silt	
			G2	588394.43	692318.94	8	0.1	19.0	-18.7	NM-w		
116	12/15/2008	Dundee Canal	G1	597834.00	743999.00	6	0	3.1	NS	NR	Brown sand & gravel	Grabs G3 & G4 used to supplement G1 and grabs G7 & G8 used to supplement G5
			G3	597830.00	744002.00	6	0	3.1	NS	NM ⁵		
			G4	597828.00	744002.00	6	0	3.1	NS	NM ⁵		
			G5	597825.00	744002.00	6	0	3.1	NS	NR		
			G7	597820.00	744005.00	6	0	3.1	NS	NM ⁵		
			G8	597829.00	744003.00	6	0	3.1	NS	NM ⁵		
117	12/15/2008	Dundee Canal	SA	SA	SA	SA	SA	SA	SA	SA	SA	Grabs not attempted due to station abandonment
118	12/16/2008	Weasel Brook	G1	597353.00	739656.00	6	0	6.4	NS	NR	Brownish-black sand & gravel mixture	Only one grab collected on 6 attempts; minimal volume

Notes:

¹ For all samples obtained and reported (see Sediment Grab Collection Record), only those grab samples retained for processing are shown.

² Salinity measured by refractometer.

³ Not measured; remainder of grab sample collected for Group B analytes discarded by the boat crew.

⁴ Measurement reading suspect.

⁵ Not measured; additional grab samples discarded by the boat crew.

NA - not applicable, grab samples attempted but no successful recovery.

SA - station abandoned.

NAD 83 - North American Datum of 1983.

NGVD 29 - National Geodetic Vertical Datum of 1929.

NM - not measured.

NM-w - not measured due to insufficient water.

NM-t - not measured due to high turbidity.

NS - not surveyed.

NR - not recorded

Table 2-9 Bulk Density for LRC Sediment Samples

Location ID 2008- CLRC	Core Number	Core Segment ID	Bulk Density (g/cm ³)
001	C1	A-B	1.26
		B-C	1.28
		C-D	1.31
		D-E	1.36
		E-F	1.73
001	C2	A-B	1.27
		B-C	1.23
002	C1	A-B	1.62
		B-C	1.98
002	C2	A-B	1.64
		B-C	1.99
003	C1	A-B	1.33
		B-C	1.58
		C-D	1.96
003	C2	A-B	1.64
004	C1	A-B	1.26
		B-C	1.32
		C-D	1.42
		D-E	1.38
		E-F	1.44
004	C2	A-B	1.27
		B-C	1.29
005	C1	A-B	1.17
		B-C	1.27
		C-D	1.36
005	C2	A-B	1.18
006	C1	A-B	1.31
		B-C	1.52
		C-D	1.62
		D-E	1.97
		E-F	1.90
006	C2	A-B	1.34
006	C3	A-B	1.35
007	C2	A-B	1.41
		B-C	1.52
		C-D	1.62
		D-E	1.79
		E-F	1.89
007	C1	A-B	1.36
008	C1	A-B	1.26
		B-C	1.26
		C-D	1.30
		D-E	1.33
'008	C2	A-B	1.24
		B-C	1.29
009	C3	A-B	1.17
		B-C	1.24
		C-D	1.25
		D-E	1.95
009	C1	A-B	1.16
010	C1	A-B	1.21
		B-C	1.23
010	C2	A-B	1.20
		B-C	1.22
		C-D	1.27
		D-E	1.31
		E-F	1.29
		F-G	1.67
011	C1	A-B	1.54
		B-C	1.60
		C-D	1.52
		D-E	1.57
		E-F	1.50
011	C2	A-B	1.53
		B-C	1.57
012	C1	A-B	1.25
		B-C	1.31
		C-D	1.27
		D-E	1.27
012	C2	A-B	1.25
		B-C	1.31
013	C2	A-B	1.22
		B-C	1.26
		C-D	1.30
013	C1	D-E	1.33
		A-B	1.23
		B-C	1.28
014	C1	C-D	1.25
		A-B	1.26
		B-C	1.22
		C-D	1.22
		D-E	1.35
		E-F	1.43
		F-G	1.78

Table 2-9 Bulk Density for LRC Sediment Samples (Continued)

Location ID 2008- CLRC	Core Number	Core Segment ID	Bulk Density (g/cm ³)
014	C2	A-B	1.26
		B-C	1.24
015	C1	A-B	1.23
015	C2	A-B	1.21
		B-C	1.45
		C-D	1.70
		D-E	1.31
016	C1	A-B	1.15
		B-C	1.16
		C-D	1.26
		D-E	1.26
		E-F	1.45
016	C2	A-B	1.16
		B-C	1.17
017	C1	A-B	1.18
		B-C	1.25
		C-D	1.24
		D-E	1.28
		E-F	1.34
		F-G	1.63
		G-H	1.96
017	C2	A-B	1.41
017	C3	A-B	1.24
018	C1	A-B	1.24
		B-C	1.34
		C-D	1.53
		D-E	1.72
018	C2	A-B	1.23
019	C3	A-B	1.19
019	C1	A-B	1.19
		B-C	1.24
019	D1	A-B	1.35
019	C2	A-B	1.18
		A-B	1.24
		B-C	1.18
020	C2	C-D	1.36
		A-B	1.23
		B-C	1.20
020	C3	A-B	1.26
		B-C	1.26
021	C1	A-B	1.26
		B-C	1.16
		C-D	1.33
021	C2	A-B	1.26
		B-C	1.13
022	C1	A-B	1.34
		B-C	1.38
		C-D	1.44
		D-E	1.70
022	C2	A-B	1.35
022	D2	A-B	1.38
023	C2	A-B	1.23
		B-C	1.22
		C-D	1.23
		D-E	1.45
023	C1	A-B	1.25
024	C1	A-B	1.20
		B-C	1.21
		C-D	1.68
024	C2	A-B	1.21
		B-C	1.20
025	C1	A-B	1.18
		B-C	1.32
025	C3	A-B	1.20
026	C1	A-B	1.34
		B-C	1.41
026	C2	A-B	1.28
		B-C	1.43
027	C1	A-B	1.22
		B-C	1.21
		C-D	1.23
		D-E	1.29
027	C2	A-B	1.22
028	C2	A-B	1.18
		B-C	1.20
		C-D	1.43
028	C1	A-B	1.21
028	D1	A-B	1.63
029	C1	A-B	1.26
		B-C	1.32
		C-D	1.40
029	C2	A-B	1.30
029	C3	A-B	1.22
030	C1	A-B	1.12
		B-C	1.18
		C-D	1.66
030	C2	A-B	1.11

Table 2-9 Bulk Density for LRC Sediment Samples (Continued)

Location ID 2008- CLRC	Core Number	Core Segment ID	Bulk Density (g/cm ³)
031	C1	A-B	1.19
		B-C	1.24
		C-D	1.55
031	C2	A-B	1.17
		B-C	1.72
032	C2	A-B	1.22
		B-C	1.20
		C-D	1.40
032	C1	A-B	1.23
033	C1	A-B	1.16
		B-C	-- ¹
033	C2	A-B	1.32
		B-C	1.67
034	C1	A-B	1.39
034	C3	A-B	1.38
034	D2	A-B	2.12
035	C5	A-B	1.90
035	C6	A-B	1.89
036	C1	A-B	1.45
		B-C	1.39
036	C2	A-B	1.50
		B-C	1.33
037	C1	A-B	1.57
		B-C	1.73
037	C2	A-B	0.87 ⁵
038	C1	A-B	1.32
		B-C	1.45
038	C2	A-B	1.34
		B-C	1.47
039	C1	A-B	1.33
		B-C	1.21
		C-D	-- ¹
039	C2	A-B	1.30
040	C1	A-B	1.38
		B-C	1.61
040	C3	A-B	1.40
041	C1	A-B	1.38
		B-C	1.30
041	C2	A-B	1.46
042	C2	A-B	1.15
		B-C	1.29
042	C1	A-B	1.23
043	C2	A-B	1.46
		B-C	2.03
043	C3	A-B	1.36
043	C5	A-B	1.48
044	C1	A-B	1.53
		B-C	2.03
044	C3	A-B	1.37
		B-C	1.90
045	C2	A-B	1.26
		B-C	1.42
		C-D	1.43
		D-E	1.40
045	C1	A-B	1.26
		B-C	1.41
046	C2	A-B	1.74
047	C1	A-B	1.57
		B-C	1.35
047	C4	A-B	1.66
047	D4	A-B	2.05
048	C2	A-B	1.48
		B-C	1.89
048	C3	A-B	1.46
		B-C	1.34
049	C1	A-B	1.84
049	C2	A-B	1.79
		B-C	1.99
050	C1	A-B	1.69
050	C2	A-B	1.57
050	C3	A-B	1.54
051	C1	A-B	2.27
051	C2	A-B	1.39
051	C4	A-B	1.80
052	C2	A-B	1.79
052	C3	A-B	1.71
053	Station Abandoned	NA	NA
054	C3	A-B	1.98
054	C1	A-B	-- ¹
055	C2	A-B	1.72
		B-C	1.83
055	C3	A-B	1.79
056	C2	A-B	1.41
		B-C	1.17
		C-D	1.34
		D-E	1.78
056	C1	A-B	1.52
057	C1	A-B	1.23
		B-C	1.53
057	C2	A-B	1.27
		B-C	-- ¹

Table 2-9 Bulk Density for LRC Sediment Samples (Continued)

Location ID 2008- CLRC	Core Number	Core Segment ID	Bulk Density (g/cm ³)
058	C1	A-B	1.36
		B-C	1.66
		C-D	1.77
058	C2	A-B	1.26
058	C3	A-B	1.33
058	C4	A-B	1.99
		B-C	2.03
059	C5	A-B	1.96
060	C1	A-B	1.20
		B-C	1.77
060	C2	A-B	1.25
		B-C	-- ¹
		C-D	1.94
061	C1	A-B	1.84
		B-C	1.86
061	C2	A-B	1.86
		B-C	1.80
062	C1	A-B	1.25
		B-C	1.51
		C-D	1.98
		D-E	1.87
062	C2	A-B	1.26
062	D1	A-B	1.77
063	C1	A-B	1.39
		B-C	1.86
063	C2	A-B	1.33
064	C1	A-B	1.82
064	C2	A-B	1.86
065	C1	A-B	1.75
065	C3	A-B	1.67
		B-C	1.55
		C-D	1.81
		D-E	1.70
066	C2	A-B	1.65
066	C1	A-B	1.81
		B-C	1.89
067	C2	A-B	1.50
		B-C	1.85
067	C3	A-B	1.53
		B-C	1.07 ⁵
068	C2	A-B	1.39
		B-C	1.89
068	C1	A-B	1.45
		B-C	1.86
069	C1	A-B	1.40
		B-C	1.92
069	C2	A-B	1.45
070	C2	A-B	1.16
070	C3	A-B	-- ¹
		B-C	1.87
1070	C1	A-B	1.87
1070	C2	A-B	1.86
071	C1	A-B	1.87
071	C3	A-B	1.74
072	C6	A-B	2.10
072	C7	A-B	1.99
073	C4	A-B	1.51
073	C2	A-B	-- ²
074	C1	A-B	1.28
		A-B	1.26
		B-C	1.36
074	C2	C-D	1.35
		A-B	1.91
075	C2	A-B	1.86
076	C4	A-B	1.91
076	C5	A-B	1.83
077	C2	A-B	1.53
077	C5	A-B	1.48
078	C1	A-B	1.42
		B-C	1.40
078	C3	A-B	1.45
		B-C	1.36
		C-D	-- ¹
078	D4	A-B	1.99
079	C2	A-B	1.65
079	C4	A-B	1.57
		B-C	1.74
'080	C1	A-B	1.68
		B-C	1.81
080	C2	A-B	1.71
		B-C	1.72
081	C2	A-B	1.84
081	C3	A-B	1.79
082	C1	A-B	1.35
		B-C	1.42
082	C2	A-B	1.41
		B-C	1.40
		C-D	1.39
		D-E	1.44
		E-F	2.15
083	C1	A-B	1.94
083	C2	A-B	1.93

Table 2-9 Bulk Density for LRC Sediment Samples (Continued)

Location ID 2008- CLRC	Core Number	Core Segment ID	Bulk Density (g/cm ³)
084	C1	A-B	1.46
		B-C	1.35
		C-D	1.82
084	C2	A-B	1.37
		B-C	1.36
085	C1	A-B	1.42
		B-C	1.37
		C-D	1.30
		D-E	1.78
085	C2	A-B	1.41
		B-C	1.38
086	C3	A-B	1.91
		B-C	1.88
086	C1	A-B	1.92
086	C5	A-B	1.41
087	C3	A-B	1.89
087	C2	A-B	1.95
088	C1	A-B	2.06
088	C2	A-B	1.97
088	C3	A-B	2.02
		A-B	1.80
089	C2	B-C	-- ¹
		A-B	-- ¹
089	C4	A-B	-- ¹
090	C1	A-B	2.61
090	C5	A-B	1.95
091	Station Abandoned	NA	NA
092	C1	A-B	2.05
092	C3	A-B	2.07
092	C4	A-B	2.10
093	Station Abandoned	NA	NA
094	Station Abandoned	NA	NA
095	Station Abandoned	NA	NA
096	C2	A-B	1.53
096	C3	A-B	1.55
097	Station Abandoned	NA	NA
098	C1	A-B	1.39
		B-C	1.18
098	C2	A-B	1.43
		B-C	1.04
099	C1	A-B	1.41
		B-C	1.29
099	C2	A-B	1.39
100	C1	A-B	1.61
100	C2	A-B	1.64
101	C1	A-B	1.27
		B-C	1.18
101	C2	A-B	1.32
102	Station Abandoned	NA	NA
103	C1	A-B	1.68
		B-C	1.61
103	C2	A-B	1.68
		A-B	1.32
104	C1	B-C	1.23
		C-D	1.12
		A-B	1.53
104	C2	B-C	1.38
		A-B	1.88
105	C3	A-B	-- ³
106	C1	A-B	-- ³
107	C2	A-B	-- ³
108	C1	A-B	1.91
108	C2	A-B	1.89
109	C3	A-B	1.56
		B-C	1.91
1'09	C2	A-B	1.58
110	C1	A-B	1.36
		B-C	1.73
		C-D	1.62
110	C2	A-B	1.32
111	C1	A-B	1.79
		B-C	2.03
111	C2	A-B	-- ¹
		B-C	2.04
111	C3	A-B	2.13
112	C2	A-B	2.28
112	C1	A-B	2.19
112	C3	A-B	2.08
113	C1	A-B	3.11
113	C3	A-B	1.55
113	C5	A-B	1.58
114	C1	A-B	1.68
		B-C	1.92
114	C2	A-B	1.67
		B-C	-- ¹
114	C3	A-B	-- ¹
115	C1	A-B	1.18
		B-C	1.36
115	C2	A-B	1.16
115	D1	A-B	1.76
116	C1	A-B	-- ⁴
116	C6	A-B	-- ⁴
116	C7	A-B	-- ⁴
117	Station Abandoned	NA	NA
118	C1	A-B	1.96
118	C2	A-B	1.83
118	C5	A-B	1.95
118	C6	A-B	1.95

Notes:

- g/cm³ - grams per cubic centimeter
- ¹ = bulk density not calculated; core segment weight not recorded
- ² = bulk density not calculated; total segment length not determined
- ³ = alternative sampling methodology used; no cores collected
- ⁴ = material in cores not submitted for analysis
- ⁵ = data suspect; bulk density likely higher than calculated value
- NA - not applicable

Table 2-10 PE for Analytical Methods Using Certified Reference Material

Analysis	Source/Catalog Number/Name	Laboratory(ies)
VOCs	RTC VOC Contaminated Soil CRM631-030	TestAmerica Laboratories, Inc. – Knoxville, Tennessee Columbia Analytical Services, Inc. – Kelso, Washington
SVOCs	RTC PAH Contaminated Soil/Sediment CRM104-100	TestAmerica Laboratories, Inc. – Knoxville, Tennessee Columbia Analytical Services, Inc. – Kelso, Washington
PAHs by HGRC/LRMS-SIM	RTC PAH Contaminated Soil/Sediment CRM104-100	TestAmerica Laboratories, Inc. – Knoxville, Tennessee
Pesticides by GC/ECD	RTC Pesticides in Soil SQC009	Columbia Analytical Services, Inc. – Kelso, Washington TestAmerica Laboratories, Inc. – Knoxville, Tennessee
Pesticides by HRGC/HRMS	RTC Pesticides in Soil SQC009	TestAmerica Laboratories, Inc. – West Sacramento, California
Toxaphene (GC/ECD)	RTC Toxaphene in Soil SQC028	Columbia Analytical Services, Inc. – Kelso, Washington TestAmerica Laboratories, Inc. – Knoxville, Tennessee
Toxaphene (HRGC/HRMS)	RTC Toxaphene in Soil SQC028	TestAmerica Laboratories, Inc. – West Sacramento, California
PCB Aroclors	RTC PCB in Soil SQC010	TestAmerica Laboratories, Inc. – Pittsburgh, Pennsylvania Columbia Analytical Services, Inc. – Kelso, Washington
PCB congeners	RTC PCB congeners in Soil SQC068	TestAmerica Laboratories, Inc. – Knoxville, Tennessee Columbia Analytical Services, Inc. – Houston, Texas
Herbicides	RTC Herbicides in Soil CRM831-050	TestAmerica Laboratories, Inc. – Pittsburgh, Pennsylvania Columbia Analytical Services, Inc. – Kelso, Washington
TPH-extractables	RTC Diesel in Soil SQC007	TestAmerica Laboratories, Inc. – Edison, New Jersey TestAmerica Laboratories, Inc. – South Burlington, Vermont
TPH-purgeables	RTC Gasoline in Soil SQC008	TestAmerica Laboratories, Inc. – Edison, New Jersey Columbia Analytical Services, Inc. – Rochester, New York
PCDD/PCDFs	RTC Dioxins and Furans in Soil QC016	Columbia Analytical Services, Inc. – Houston, Texas TestAmerica Laboratories, Inc. – Knoxville, Tennessee
PCDD/PCDFs	Wellington Laboratories WMS-01 Lake Sediment NIST SRM1944	Columbia Analytical Services, Inc. – Houston, Texas
Metals	RTC Metals on Sewage Sludge CRM018-050	Columbia Analytical Services, Inc. – Kelso, Washington Brooks Rand – Seattle, Washington
Mercury, Methyl Mercury	RTC Estuarine Sediment ERM CC580	Brooks Rand – Seattle, Washington Columbia Analytical Services, Inc. – Kelso, Washington
Cr(VI)	RTC Chromium VI in Soil SQC 012	Columbia Analytical Services, Inc. – Rochester, New York TestAmerica Laboratories, Inc. – Edison, New Jersey
Butyltins	RTC European Commission Certified Reference Material BCR-646	Columbia Analytical Services, Inc. – Kelso, Washington TestAmerica Laboratories, Inc. – South Burlington, Vermont
Ammonia	RTC Nutrients in Soil SQC014	Columbia Analytical Services, Inc. – Kelso, Washington TestAmerica Laboratories, Inc. – North Canton, Ohio
Grain Size	NIST 8010 Material C	Columbia Analytical Services, Inc. – Kelso, Washington

Table 2-11 Laboratory Audit Summary

Laboratory Audited	AECOM Auditor	Date of Audit	Parameters Audited
Brooks Rand	Dion Lewis	6/10/2008	Total Mercury (Method 1631E)
			Methyl Mercury (Method 1630)
Columbia Analytical Services, Inc. – Kelso	Dion Lewis	6/11/2008	Metals (Method 6010B)
	Ann Biegelsen		Metals (Method 6020)
			Butyltins
			General chemistry (TOC, ammonia, CN, TKN, phosphorus, sulfide)
			AVS/SEM
			Geotechnical (grain size, Atterberg limits)
Columbia Analytical Services, Inc. – Houston	Robert Kennedy	7/10/2008	PCDDs/PCDFs
Test America Laboratories, Inc. – Edison	Greg Malzone	6/20/2008	TPH-extractables
			TPH-purgeables
TestAmerica Laboratories, Inc. – Knoxville	Robert Kennedy	6/17 - 6/18/2008	VOCs
	Ann Biegelsen		SVOCs
			PAHs by HRGC/LRMS SIM
			Pesticides by GC/ECD
			PCB congeners
TestAmerica Laboratories, Inc. – Pittsburgh	Greg Malzone	6/24/2008	PCB Aroclors
			Herbicides
TestAmerica Laboratories, Inc. – West Sacramento	Robert Kennedy ¹	7/8/2008	Pesticides (HRGC/HRMS method)

Note:

¹ Polly Newbold of ddms, inc. also was present during this audit.

Table 2-12 Data Qualification Codes and Definitions

Qualifier	Definition¹
J	The analyte was positively identified; the associated numerical value is the approximate concentration of the analyte in the sample.
N	The analysis indicates the presence of an analyte for which there is presumptive evidence to make a “tentative identification.”
JN	The analysis indicates the presence of an analyte that has been “tentatively identified” and the associated numerical value represents its approximate concentration.
UJ	The analyte was not detected above the reported sample quantitation limit. However, the reported quantitation limit is approximate and may or may not represent the actual limit of quantitation necessary to accurately and precisely measure the analyte in the sample.
U	The analyte was analyzed for, but was not detected above the reported sample quantitation limit.
R	The sample results are rejected due to serious deficiencies in the ability to analyze the sample and meet quality control criteria. The presence or absence of the analyte cannot be verified.
B	The result may be a false positive (totally attributed to blank contamination) (radiochemical data only) ² .
JB	The result may be biased high, partially attributed to blank contamination (radiochemical data only) ² .
Q	The associated sample results combined standard uncertainty exceeded the project required uncertainty (radiochemical data only) ² .

Notes:

¹ Qualifiers definitions are consistent with EPA Region 2 data validation guidance documents except where noted.

² Source is USEPA (2004).

Table 2-13 Summary of MPI Split Sampling

Location 2008-CLRC-	AECOM Sample ID	MPI Sample ID	Process Location	Processed Date	Depth Interval (feet bss)	VOCs / % moisture	PCDDs/PCDF	PCB Congener	PCB Aroclor	HR Pesticides	Mercury	SVOCs	Metals	Cyanide	TOC	PAHs	Herbicides	TPH- extractables
067	08A-0067-C2ES	08A-0067-C2ES-MP	CPG facility	8/5/2008	3.4 - 5.25	X	X	X	X	X	X	X	X	X		X	X	X
062	08A-0062-C1IS	08A-0062-C1IS-MP	CPG facility	8/13/2008	10.6-12.0	X												
	08A-0062-C1ES	08A-0062-C1ES-MP	CPG facility	8/13/2008	3.5-5.5		X	X	X	X	X	X	X	X		X	X	X
	08A-0062-C1FS	08A-0062-C1FS-MP	CPG facility	8/13/2008	5.5-7.3		X	X	X	X	X	X	X	X		X	X	X
	08A-0062-C1GS	08A-0062-C1GS-MP	CPG facility	8/13/2008	7.3-9.5		X	X	X	X	X	X	X	X		X	X	X
044	08A-0044-G2AS	08A-0044-G2AS-MP	Boat	8/19/2008	0-0.5	X												
043	08A-0043-C2DS	08A-0043-C2DS-MP	CPG facility	8/19/2008	2.5-3.0	X												
	08A-0043-C2BS	08A-0043-C2BS-MP	CPG facility	8/19/2008	0.5-1.5		X	X		X					X	X		X
	08A-0043-C2CS	08A-0043-C2CS-MP	CPG facility	8/19/2008	1.5-2.5		X	X		X					X	X		X
	08A-0043-C2ES	08A-0043-C2ES-MP	CPG facility	8/19/2008	3.0-5.5	X												
	08A-0043-C4BS	08A-0043-C4BS-MP	CPG facility	8/19/2008	0.5-1.5				X			X					X	
	08A-0043-C4CS	08A-0043-C4CS-MP	CPG facility	8/19/2008	1.5-2.5				X			X					X	
	08A-0043-C5BS	08A-0043-C5BS-MP	CPG facility	8/19/2008	0.5-1.5						X		X	X				
	08A-0043-C5CS	08A-0043-C5CS-MP	CPG facility	8/19/2008	1.5-2.5						X		X	X				
051	08A-0051-C1BS	08A-0051-C1BS-MP	CPG facility	8/26/2008	0.5-1.5	X	X	X	X	X		X				X	X	
	08A-0051-C2BS	08A-0051-C2BS-MP	CPG facility	8/26/2008	0.5-1.5						X		X	X	X			X
	08A-0051-C2CS	08A-0051-C2CS-MP	CPG facility	8/26/2008	1.5-2.5	X	X	X	X	X	X	X				X	X	
	08A-0051-C4CS	08A-0051-C4CS-MP	CPG facility	8/26/2008	1.5-2.5						X		X	X	X			X
056	08A-0056-G6AS	08A-0056-G6AS-MP	Boat	8/27/2008	0-0.5	X												
050	08A-0050-C1DS	08A-0050-C1DS-MP	CPG facility	9/3/2008	2.5-3.24	X												
	08A-0050-C1BS	08A-0050-C1BS-MP	CPG facility	9/3/2008	0.5-1.5		X	X		X						X		
	08A-0050-C1CS	08A-0050-C1CS-MP	CPG facility	9/3/2008	1.5-2.5		X	X		X					X	X		X
	08A-0050-C2BS	08A-0050-C2BS-MP	CPG facility	9/3/2008	0.5-1.5				X			X					X	
	08A-0050-C2CS	08A-0050-C2CS-MP	CPG facility	9/3/2008	1.5-2.47				X		X	X	X	X			X	
	08A-0050-C3BS	08A-0050-C3BS-MP	CPG facility	9/3/2008	0.5-1.5						X		X	X	X			X
081	08A-0081-C2DS	08A-0081-C2DS-MP	CPG facility	9/10/2008	2.5-3.1	X												
089	08A-0089-C2DS	08A-0089-C2DS-MP	CPG facility	9/17/2008	2.5-3.0	X												
	08A-0089-C2BS	08A-0089-C2BS-MP	CPG facility	9/17/2008	0.5-1.5		X	X	X	X	X	X	X	X	X	X	X	X
	08A-0089-C2CS	08A-0089-C2CS-MP	CPG facility	9/17/2008	1.5-2.5		X	X	X	X	X	X	X	X	X	X	X	X
019	08A-0019-C3DS	08A-0019-C3DS-MP	CPG facility	9/24/2008	2.5-3.5	X	X	X		X						X		X
	08A-0019-C3BS	08A-0019-C3BS-MP	CPG facility	9/24/2008	0.5-1.5		X	X		X						X		
	08A-0019-C3CS	08A-0019-C3CS-MP	CPG facility	9/24/2008	1.5-2.5		X	X		X						X		X
	08A-0019-C1BS	08A-0019-C1BS-MP	CPG facility	9/24/2008	0.5-1.5						X		X	X	X			X
	08A-0019-C1CS	08A-0019-C1CS-MP	CPG facility	9/24/2008	1.5-2.5						X		X	X	X			
	08A-0019-C1DS	08A-0019-C1DS-MP	CPG facility	9/24/2008	2.5-3.5						X		X	X	X			
	08A-0019-C2BS	08A-0019-C2BS-MP	CPG facility	9/24/2008	0.5-1.5				X			X					X	
	08A-0019-C2CS	08A-0019-C2CS-MP	CPG facility	9/24/2008	1.5-2.5				X			X					X	
	08A-0019-C2DS	08A-0019-C2DS-MP	CPG facility	9/24/2008	2.5-3.5				X			X					X	
	08A-0019-C1ES	08A-0019-C1ES-MP	CPG facility	9/24/2008	3.5-5.27	X												
98	08A-0098-C1ES	08A-0098-C1ES-MP	CPG facility	10/1/2008	3.5-5.5		X	X	X	X	X	X	X	X	X	X	X	X
	08A-0098-C1FS	08A-0098-C1FS-MP	CPG facility	10/1/2008	5.5-7.5		X	X	X	X	X	X	X	X	X	X	X	X
038	08A-0038-C1DS	08A-0038-C1DS-MP	CPG facility	10/21/2008	2.5-3.5	X												
	08A-0038-C1ES	08A-0038-C1ES-MP	CPG facility	10/21/2008	3.5-5.5		X	X		X	X		X	X	X	X		
	08A-0038-C1ES	08A-0200-C1ES-MP ¹	CPG facility	10/21/2008	3.5-5.5		X	X		X	X		X	X	X	X		
	08A-0038-C2ES	08A-0038-C2ES-MP	CPG facility	10/21/2008	3.5-5.5				X			X					X	X
	08A-0038-C2ES	08A-0200-C2ES-MP ¹	CPG facility	10/21/2008	3.5-5.5				X			X					X	X

Table 2-13 Summary of MPI Split Sampling (Continued)

Location 2008-CLRC-	AECOM Sample ID	MPI Sample ID	Process Location	Processed Date	Depth Interval (feet bss)	VOCs / % moisture	PCDDs/PCDF	PCB Congener	PCB Aroclor	HR Pesticides	Mercury	SVOCs	Metals	Cyanide	TOC	PAHs	Herbicides	TPH- extractables
026	08A-0026-C1DS	08A-0026-C1DS-MP	CPG facility	10/28/2008	2.6-3.6	X												
	08A-0026-C1ES	08A-0026-C1ES-MP	CPG facility	10/28/2008	3.6-5.48		X	X	X	X	X	X	X	X	X	X	X	X
020	08A-0020-C2CS	08A-0020-C2CS-MP	CPG facility	11/4/2008	1.5-2.5		X	X		X	X		X	X	X	X		
	08A-0020-C2DS	08A-0020-C2DS-MP	CPG facility	11/4/2008	2.5-3.5	X	X	X		X						X		X
	08A-0020-C2ES	08A-0020-C2ES-MP	CPG facility	11/4/2008	3.5-5.5		X	X		X	X		X	X	X	X		X
	08A-0020-C2ES	08A-0201-C2ES-MP ¹	CPG facility	11/4/2008	3.5-5.5		X	X		X	X		X	X	X	X		X
	08A-0020-C3CS	08A-0020-C3CS-MP	CPG facility	11/4/2008	1.5-2.5				X			X					X	X
	08A-0020-C3DS	08A-0020-C3DS-MP	CPG facility	11/4/2008	2.5-3.5				X		X	X	X	X	X		X	
	08A-0020-C3ES	08A-0020-C3ES-MP	CPG facility	11/4/2008	3.5-5.5				X			X					X	
	08A-0020-C3ES	08A-0201-C2ES-MP ¹	CPG facility	11/4/2008	3.5-5.5				X			X					X	
002	08A-0002-C1GS	08A-0002-C1GS-MP	CPG facility	11/11/2008	6.75-8.0	X												
	08A-0002-C1GS	08A-0202-C1GS-MP ¹	CPG facility	11/11/2008	6.75-8.0	X												
	08A-0002-C1ES	08A-0002-C1ES-MP	CPG facility	11/11/2008	3.5-5.5		X	X		X	X		X	X	X	X		X
	08A-0002-C1FS	08A-0002-C1FS-MP	CPG facility	11/11/2008	5.5-6.75		X	X		X	X		X	X	X	X		X
	08A-0002-C2ES	08A-0002-C2ES-MP	CPG facility	11/11/2008	3.5-5.5				X			X					X	
	08A-0002-C2FS	08A-0002-C2FS-MP	CPG facility	11/11/2008	5.5-7.0				X			X					X	
006	08A-0006-C1DS	08A-0006-C1DS-MP	CPG facility	11/18/2008	2.5-3.5		X	X		X						X		X
	08A-0006-C1BS	08A-0006-C1BS-MP	CPG facility	11/18/2008	0.5-1.5		X	X		X						X		X
	08A-0006-C2BS	08A-0006-C2BS-MP	CPG facility	11/18/2008	0.5-1.5						X		X	X	X			
	08A-0006-C2DS	08A-0006-C2DS-MP	CPG facility	11/18/2008	2.5-3.5						X		X	X	X			
	08A-0006-C3BS	08A-0006-C3BS-MP	CPG facility	11/18/2008	0.5-1.5				X			X					X	
	08A-0006-C3DS	08A-0006-C3DS-MP	CPG facility	11/18/2008	2.5-3.5				X			X					X	
017	08A-0017-C1BS	08A-0017-C1BS-MP	CPG facility	12/2/2008	0.5-1.5		X	X		X						X		
	08A-0017-C1DS	08A-0017-C1DS-MP	CPG facility	12/2/2008	2.5-3.5		X	X		X						X		X
	08A-0017-C3BS	08A-0017-C3BS-MP	CPG facility	12/2/2008	0.5-1.5						X		X	X	X			X
	08A-0017-C3DS	08A-0017-C3DS-MP	CPG facility	12/2/2008	2.5-3.5						X		X	X	X			
	08A-0017-C2BS	08A-0017-C2BS-MP	CPG facility	12/2/2008	0.5-1.5				X			X					X	
	08A-0017-C2DS	08A-0017-C2DS-MP	CPG facility	12/2/2008	2.5-3.5				X			X					X	
084	08A-0084-C1ES	08A-0084-C1ES-MP	CPG facility	12/9/2008	3.5-5.5		X	X		X	X		X	X	X	X		X
	08A-0084-C1FS	08A-0084-C1FS-MP	CPG facility	12/9/2008	5.5-7.5		X	X	X	X	X	X	X	X	X	X	X	X
	08A-0084-C2ES	08A-0084-C2ES-MP	CPG facility	12/9/2008	3.5-5.5				X			X					X	

Note: Split samples collected from station 059 on 8/12/08 discarded; sample intervals not submitted for analysis. Split samples for that week collected on 8/13/08.

¹ MPI duplicate sample.

bss - below sediment surface.

VOC - volatile organic compound.

SVOC - semivolatile organic compound.

PCB - polychlorinated biphenyl.

PAH - polynuclear aromatic hydrocarbon.

TOC - total organic carbon.

TPH - total petroleum hydrocarbon.

Table 2-14 Location of Field and Laboratory Data

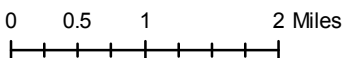
Data Type	Location
2005 MPI HASP Signature Pages	Project files at AECOM
Air Monitoring Calibration Forms	Project files at AECOM
Ambient Air Monitoring from CPG field facility	Project files at AECOM; summarized in Appendix C
Bulk density data (field determination)	Summarized in Table 2-9
Chain of Custody Forms	Project files at AECOM; included with laboratory data reports (Appendix Q) by reference with previous submittal dates to USEPA
Core and Grab photos	Project files at AECOM; included in Appendix L on CD
Core elevation (river bottom)	Project files at AECOM; summary Table 2-2 - derived from water level data in Chapter 2.0
Core Field Custody and Transfer Forms	Project files at AECOM
CSC Environmental Solutions Reports	Appendix S
Daily Activity Log	Project files at AECOM; included as Appendix I
Daily boat inspection	Project files at AECOM
Daily Float Plan	Project files at AECOM
Daily weather conditions	Project files at AECOM (field notebook, core and grab collection forms)
Data Quality Objective Tables	Appendix A
Data Results Summary	Appendix O
Data Validation Reports	Project files at AECOM; summary and updates included in Appendix N
External Lab Audits	Project files at AECOM
Extreme Value Evaluation	Appendix R
Eyewash Inspection Form	Project files at AECOM
Field log books	Project files at AECOM
Field Modification Form	Project files at AECOM; summary and forms included in Appendix B
Fire Extinguisher Inspection Form	Project files at AECOM
Fish/Creel Angler Form	Project files at AECOM
First Aid Kit Inspection Form	Project files at AECOM
GPS data - for x,y coordinates	Summary Tables 2-2 and 2-8 , and Figure 1-2
HASP Addendum Acceptance	Project files at AECOM
Health & Safety Daily Briefing	Project files at AECOM
Health & Safety Personnel Records	Project files at AECOM
Investigation Derived Waste Summary	Project files at AECOM; included as Appendix H

Table 2-14 Location of Field and Laboratory Data (Continued)

Data Type	Location
Initial Boat Inspection Form	Project files at AECOM
Job Safety Analysis Forms	Project files at AECOM
Journey Management Plan	Project files at AECOM
Laboratory EDD/Data Reports	Submitted electronically in MEDD Region 2 format with monthly progress report
Laboratory Data Reports	Project files at AECOM; included in Appendix Q by reference with previous submittal dates to USEPA
Lithology Core Records	Project files at AECOM; included as Appendix K
Non Angler Forms	Project files at AECOM
Nonconformance Forms	Project files at AECOM; included as Appendix B
PCB Partitioning Study	Project files at AECOM; report to be submitted under separate cover.
Performance Evaluation Sample Results Summary	Project files at AECOM; summarized in Appendix M
Personnel Sign In Records	Project files at AECOM
Photo log (core and grab photos)	Project files at AECOM
Probing Data	Project files at AECOM; summarized in Appendix E
Field QC Results Summary	Appendix P
Refractometer (Salinity) Results	Project files at AECOM; data summarized in Table 2-8
Safety Audit	Project files at AECOM
Sample Collection Records	Project files at AECOM
Sample Summary Table	Appendix D
Sediment Core Collection Records	Project files at AECOM; included as Appendix G
Sediment Grab Collection Records	Project files at AECOM; included as Appendix J
Subcontractor equipment issues	Project files at AECOM in field notebook
Summary of Adjusted TCDD/F data	Appendix T
Supervisor's Accident Investigation Report	Not needed, no accidents
Technical Audits of Field Activities	Project files at AECOM
Tidal Gauge Data and Water Level Record	Project files at AECOM; summarized in Appendix F
Walk-in Cooler Daily Temperature Log (at CPG field facility)	Log kept at CPG field facility



**Figure 2-1 Water Level Monitoring Stations
in the Lower Passaic River**



AECOM

November 2009
Ortho: 2007 - 2008, NJ Office of Information Technology (NJGIT),
Office of Geographic Information Systems (OGIS)

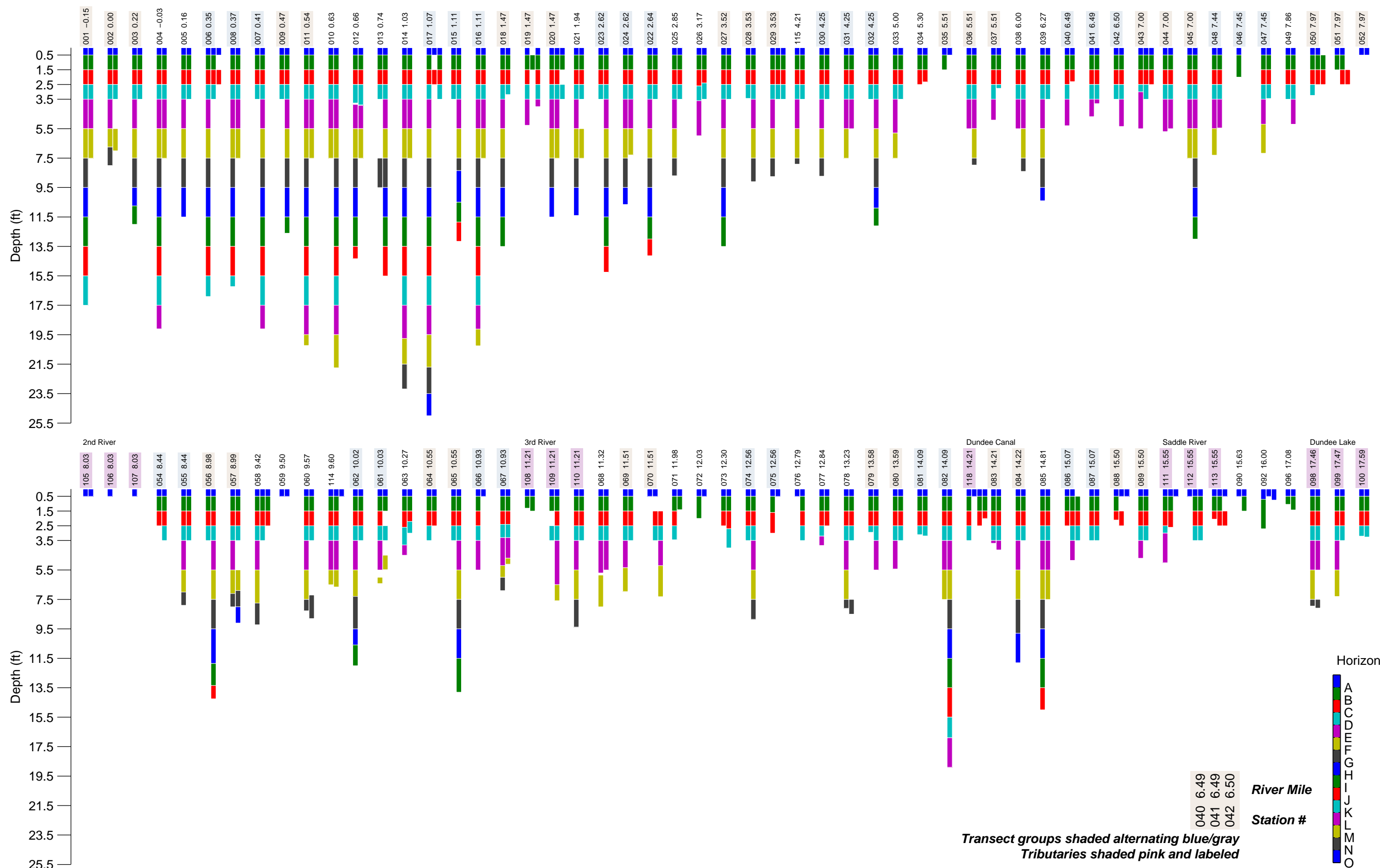


Figure 2-2 Sampled Core Intervals By River Mile and Depth

3.0 LRC Results

This section contains tables and figures of the LRC data that help characterize the physical properties and nature and extent of contaminated sediments in the LPRSA. No interpretation of the data is included in this section. All data presented in this section have been validated using the process described in Section 2.11. Data qualifiers are not presented in the tables and figures although they are shown in **Appendix O**, which includes complete tables of analytical data for each analyte group for all samples collected. The analytical results are included in the database, provided to USEPA electronically and referenced per **Appendix Q**.

For the purpose of presentation in this section, a subset of analytes was selected to illustrate physical properties and chemical nature and extent within the LPRSA sediments (**Table 3-1**). These analytes were selected to cover a range of analytes and include those that have been the focus of other data reviews, including the contaminants of potential concern (COPCs) defined in the Empirical Mass Balance Model of the Focused Feasibility Study (MPI 2007b). For these data presentations, samples that had associated field duplicates are represented by an average of the detected results; if one result was not detected, the value of the detected result is used, and if both were not detected, the sample is shown as "ND" at the average of the detection limits (DLs). The data results are presented below in subsections organized in accordance with the groupings detailed in Chapter 2.0.

3.1 Group A

Group A includes an extensive list of chemical, radiochemical and physical analyses that were performed at all stations to determine the physical and chemical characteristics of the sediments. A set of figures and tables present the Group A data in several formats to characterize the physical nature of the sediments and the nature and extent of chemical contamination. The complete list of Group A analytes is provided in Section 2.5.1.

3.1.1 Concentration Box and Whisker Diagrams

Figures 3-1.a through **3-1.n** present box and whisker diagrams of analyte concentrations and physical parameters for the sediment sampling stations in the Passaic River (excluding tributary locations) grouped into two mile segments. Box and whisker diagrams are plotted for Surface Data, Subsurface Data, and All Depths Data using Group A cores: Surface Data plots represent 0- to 0.5- foot depth below sediment surface; Subsurface Data plots represent sediment depths greater than 0.5-feet; and the All Depths Data plots contain all of the available data. The chemical concentrations are presented on a dry weight basis. To maintain a consistent set of comparable data collected by the same procedures, data for the grab samples and the finer segmentation cores are not included.

3.1.2 Surficial Sediment Concentrations by River Mile

Figures 3-2.a through **3-2.x** present analyte concentrations and physical parameters in the surficial sediments versus RM of the sampling station. The subset of analytes and parameters included in these figures is presented in **Table 3-1**. RMs are based on the centerline developed by MPI and were extended above the Dundee Dam for the LRC locations in Dundee Lake. Core locations in the tributaries are plotted at the RM location at the confluence of the tributary with the LPR. Surficial sediment data from the 0- to 0.5-foot interval of the Group A sediment cores are used for these figures. To maintain a consistent set of comparable data collected by the same procedures, data for the grab samples and the finer segmentation cores are not included. Because chemical concentrations in sediments frequently vary with TOC concentrations (particularly hydrophobic organic carbons such as PCBs and tetrachlorodibenzodioxin [TCDD]), chemical concentrations are presented both on a dry weight basis and normalized to TOC. The plots are presented with both linear and log concentration scales to better depict the variation in the surficial sediment concentrations. Extreme values (if present, determined by visual observation) were removed on the linear scale plots and noted on the log scale plots.

3.1.3 Surficial Sediment Concentrations Maps

Figures 3-3.a through 3-3.n present maps of analyte concentrations and physical parameters in surficial sediments. The subset of analytes and parameters included in these maps is presented in **Table 3-1**. Data included in these figures are limited to sediment results from the 0- to 0.5-foot interval for the Group A analytes. To maintain a consistent set of comparable data, data for the grab samples and the finer segmentation cores are not included. Station locations for the LRC cores are identified as 2008-CLRC-xxx, where xxx is a code specific to each location. On these maps, locations are identified using the unique three digit location code (xxx) only. Data are presented in units per kilogram (kg) of dry weight sediment, with no carbon normalization. Color symbology was developed by dividing the concentration range by percentile values (25%, 50%, 75%, and 90%). The concentrations at each location are presented below the location code. At locations where the analyte was not detected, the concentration is shown as the DL. Included on these maps are the RM markers (as provided by MPI in previous studies and extended above Dundee Dam for the LRC program).

3.1.4 Analyte Concentrations by Depth

Figures 3-4.a through 3-4.n present plots of analyte concentrations and physical parameters by depth. The subset of analytes and parameters included in these plots is presented in **Table 3-1**. Data included in these figures are limited to sediment results for the Group A analytes. To maintain a consistent set of comparable data, data for the grab samples and the finer segmentation cores are not included. Station locations for the LRC cores are identified as 2008-CLRC-xxx, where xxx is a code specific to each location. On these plots, locations are identified using the unique three digit location code (xxx) only. Data are presented in units per kg of dry weight sediment, with no carbon normalization. Color symbology was developed by dividing the concentration range by percentile values (25%, 50%, 75%, and 90%). At locations where the analyte was not detected, the concentration is shown as the DL.

3.1.5 Analyte Concentrations vs. Total Organic Carbon

Figures 3-5.a through 3-5.m present analyte concentrations and physical parameters in the surficial sediments versus TOC of the sample. The subset of analytes and parameters included in these figures is presented in **Table 3-1**. Core locations in the tributaries are included in these figures and they are identified with unique symbols for each tributary. Surficial sediment data from the 0- to 0.5-foot interval of the Group A sediment cores are used for these figures. To maintain a consistent set of comparable data collected by the same procedures, data for the grab samples and the finer segmentation cores are not included. Chemical concentrations are presented on a dry weight basis. The plots are presented on linear concentration scales.

3.1.6 Vertical Downcore Profiles

Figures 3-6.a through 3-6.n show vertical analyte profiles at all LRC locations. The subset of analytes included in these plots is presented in **Table 3-1**, with the addition of unsupported Pb-210 (see discussion in Section 3.1.5) in **Figure 3-6.m**. Station locations for the LRC cores are identified as 2008-CLRC-xxx, where xxx is a code unique to each location. For these figures, the locations are identified using the three digit location code (xxx) only. The RM is included for each core. Each plot presents the analyte concentration depth profile for each segment analyzed in the core, plotted at the mid-depth (based on recovered depth) of the core segment. Each plot also presents the Cs-137 concentration and grain size profile, where grain size is represented as percent passing the #230 sieve; higher percentage values indicate finer sediments. At some of the locations, only one segment was collected and analyzed for several of the analytes, and only a single point appears in the plots.

Multiple cores were collected at each location to obtain sufficient sample volume for the comprehensive analyte list. Some cores with the same location identification have slightly different RM designations, depending on the exact location at which the cores were collected. RM designations are detailed in Chapter 1.0.

3.1.7 Analytical Summary Tables

A set of summary tables for the selected subset of chemical analytes are presented in **Tables 3-2 to 3-5**. These tables summarize the highest concentrations and their locations for each of the chemical analytes identified in **Table 3-1**. All sampling intervals are represented by their mid-depth value. **Table 3-2** presents the single highest concentration for each analyte from the 0- to 0.5-foot surficial interval (**Table 3-2.a**) and from all sampling intervals (**Table 3-2.b**). **Table 3-3** presents the ten highest surficial concentrations, and **Table 3-4** presents the 10 highest concentrations from all sampling intervals. **Table 3-5** presents the maximum concentration and the depth of the maximum concentration in each core. The shaded cells represent maximum analyte concentration depths that were located at or below the depth of the maximum Cs-137 concentration, providing an indication of the time frame during which the maximum concentrations were deposited and the stability of the sediments (see Section 3.1.5 for a discussion of Cs-137 dating).

The full suite of chemical results for each sample is provided in **Appendix O**.

3.1.8 Radiochemistry Analysis

LRC sediment samples were analyzed for Ra-226, Cs-137, and Pb-210 (measured as Po-210) to calculate net sedimentation rates and evaluate sediment stability. Radionuclide data was obtained from each sediment segment at each station. Information about the timing of the sources and the half-lives of these radionuclides allow for the dating of sediment and for the evaluation of the net sedimentation rate and stability of the sediment bed over time.

The notable features of a Cs-137 profile include the onset of Cs-137 in sediments (which characterizes approximately the 1954 sediment horizon, when Cs-137 was first introduced through atmospheric testing of atomic weapons), the peak Cs-137 concentration (which characterizes approximately the 1963 sediment horizon when the maximum testing level was achieved), and the pattern of Cs-137 between the peak concentration and the lower concentrations of more recently deposited surficial sediments. The presence or absence of these dating markers provides an important line of evidence for evaluation of sediment stability, and net sedimentation rates can be calculated from these markers.

Observed Pb-210 in sediments is from ongoing atmospheric fallout which mixes with sediments and from the decay of naturally occurring uranium within the sediments. The first source, the atmospheric fallout (referred to as unsupported lead concentration), is a measure of continuous sediment deposition. The Pb-210 derived from the decay of uranium within the sediments is referred to as background or supported Pb-210 concentration. The Ra-226 concentration was measured in each sediment segment to provide a means to separate the supported from the unsupported Pb-210 contributions. These data can be analyzed to calculate net sedimentation rates from the unsupported Pb-210 concentrations.

3.1.9 Evaluation of Extreme Values

An extreme value analysis was performed on the LRC surficial sediment contaminant concentration data to determine if any individual data points are statistical outliers or extreme values. The goal of the analysis was to identify extreme data points that do not appear to be part of the general population. The identification of extreme values is an analysis of the values in any given dataset, and does not indicate the potential for risk or need for remedial decisions. The full set of analyses is presented in **Appendix R**.

The analysis focused on the surficial sediments (0-0.5 ft interval) and included both core and grab sample results. The analysis was focused on surficial sediments for two reasons: 1) an ultimate goal in evaluation of the outliers may be to identify any potential additional contributions to risk, and it is consistent with the Risk Assessment Data Usability and Data Evaluation Plan to evaluate only the surface sediments; and 2) evaluation of the LRC data indicates that concentrations vary greatly with depth, up to several orders of magnitude for some COPCs, and this wide variation has the potential to complicate the identification of extreme values or potential outliers. All surficial sediment sample locations were included in the analysis (i.e., tributaries and Dundee Lake locations)

3.1.9.1 Selection of Constituents

Selection of constituents evaluated for the presence of extreme values was consistent with the data presentation in Section 3.1. Some constituents were evaluated as summed concentrations (i.e., total PCBs congeners, total 4,4'-DDx (sum of DDD, DDE and DDT isomers), total Chlordane, total low molecular weight (LMW) PAHs, total high molecular weight (HMW) PAHs), and 2,3,7,8-TCDD TEQ was included in the analysis. Summed constituents were calculated consistent with Section 2.12 and **Table 3-1**. Constituents with 10 or fewer samples (e.g., the Group B constituent list) were not included in the analysis. Frequency of detection was calculated for each of the individual and summed constituents. The analysis was restricted to constituents with a frequency of detection of 50% or greater to focus on those constituents more commonly observed in the LPR (See **Appendix O** for frequency of detection for all constituents). **Table 3-6** presents the selected constituents and their frequency of detection.

All metals analyzed were detected in 100% of the surface samples, with the exception of cyanide (52%), selenium (54%) and thallium (96%). While the frequency of detection of tetrabutyltin (9%) was less than 50%, the other organotins were detected with the same approximate frequency; dibutyltin, monobutyltin and tributyltin were detected in 83%, 86% and 80% of samples, respectively. Of the 51 VOCs analyzed in the samples, only three were detected in greater than 50% of samples, with frequency of detection ranging from 52% to 60%. Twenty of the 68 SVOCs were detected in greater than 50% of samples. Twenty of 28 pesticides were detected in greater than 50% of samples; none of the herbicides were in greater than 50% of samples.

Additional analysis of the vertical and horizontal distribution of constituents detected in greater than 50% of the samples will be performed as part of the RI process, and will incorporate additional data as these become available from subsequent investigation programs.

3.1.9.2 Methods

The evaluation of extreme values was generally consistent with USEPA (2010b) Technical Guidance for ProUCL and USEPA (2006b) Data Quality Assessment: Statistical Methods for Practitioners. USEPA (2006b) identifies five steps involved in evaluating extreme values or outliers:

1. Identify extreme values that may be potential outliers;
2. Apply statistical test;
3. Scientifically review statistical outliers and decide on their disposition;
4. Conduct data analyses with and without statistical outliers; and
5. Document the entire process.

In the present evaluation of extreme values in the LRC surficial sediment data, steps 1 and 2 listed above were performed. The evaluation was focused on upper end extreme values only, as lower end values are likely to include a large number of non-detect values, and varying DLs would obscure potential true extreme low values. Steps 3 and 4 will be performed as analysis of the data continues, and submitted with the complete evaluation and interpretation of the LRC data in the RI report. Consistent with step 5, the entire process, described below, has been documented in a transparent and reproducible manner.

The flow chart of decisions used to determine extreme values is presented in **Figure 3-7**. The following is an overview of the set of analyses:

1. Datasets (note that nondetects were set equal to DLs) were tested for distribution using Lilliefors' Test ($\alpha = 0.05$) supplemented by box plots and quantile-quantile (Q-Q) plots of untransformed and log-transformed data.
2. Datasets that were normal or lognormal were evaluated using Rosner's Test ($\alpha = 0.05$) on untransformed or log-transformed data, respectively.

3. If a dataset appeared to have a few upper end values that prevented a normal or lognormal distribution, the dataset was tested for goodness-of-fit without those presumed outlying values. If the result indicated normal or lognormal distribution, the entire dataset was tested using Rosner's Test and untransformed or log-transformed data, respectively.
4. If the dataset appeared to follow neither a normal or log-normal distribution, and testing without presumed upper end outlying values did not achieve a normal or log-normal distribution, the test for extreme values was conducted using a distribution-free method where extreme values were those that exceeded 75th percentile + 3 x Interquartile Range (IQR). The IQR is equal to the difference between the 75th and 25th percentiles of the dataset. This IQR approach to the determination of extreme values has been presented in USEPA (2006b).

Those COPCs that did not fit a normal or lognormal distribution and had values greater than the 75th percentile + 3 x IQR were subject to visual inspection consistent with USEPA (2006b) Guidance. This inspection, which used probability plots of the data, focused on identifying substantial changes in concentration (i.e., changes in position on the "y" axis) between two points ordered within the probability plots. Based on visual inspection, uppermost values that were higher than adjacent values by approximately 50% were considered not typical of observed concentration distributions. Those values that appeared to be part of the general population (i.e., not greater than 150% of adjacent values) were flagged for further consideration of status as extreme values.

3.1.9.3 Results

The results of the extreme value evaluation are provided in **Tables 3-7** and **3-8**. **Table 3-7** is organized by constituent and identifies the findings of separate steps in the analysis. For each constituent, **Table 3-7** specifies the sample ID and concentration of those samples found to be outliers, as well as the mean and median concentrations of the data set. The values that were identified as potential upper end extreme values based on the evaluation of the IQR, yet do not appear to be extreme values based on visual inspection, are flagged with an asterisk. **Table 3-8** is organized by sample location. For each sample, those constituents found to be a potential outlier are listed. When available, circumstances that may provide perspective on the potential outlier are noted in **Table 3-8**.

This analysis identifies extreme values that may potentially be outliers of the data sets. Identification of outliers (steps 3 and 4 above) will be performed when data are interpreted for development of the site conceptual model, initialization of the fate and transport model, and the risk assessment. The end users of the data will perform these analyses as appropriate to the use of the data (e.g., for the risk assessment, data may be evaluated by river reach rather than the whole river), and assess the potential implications of these extreme values.

3.2 Group B

In addition to the analytes in Group A, additional organic and nutrient analyses were completed at 11 stations for preliminary assessment of bioavailability and non-hazardous substance list stressors. The stations were selected to provide adequate spatial coverage throughout the length of the river, with a focus on areas of finer-grained sediments. Surficial (0- to 0.5-foot) samples were collected at 11 of the Group B stations. These analyses include methyl mercury, AVS/SEM, TPH (purgeable), Cr(VI), total phosphorus, ammonia (as N), and TKN. All samples were collected through grab sampling, with the exception of phosphorous, TKN and ammonia, which were retrieved from cores. The preliminary assessment of these data suggests the presence of potential stressors of concern in the LPRSA, and additional data may be collected in future sediment sampling programs to better characterize their potential impact. Individual analyte sub-groups are discussed briefly below.

3.2.1 Mercury and Methyl Mercury

Sediments were analyzed for methyl mercury to support characterization of mercury dynamics, evaluation of mercury availability and toxicity, and for numerical model development. These data were compared to the colocated mercury data (**Table 3-9**). For each paired location, the percentage of methyl mercury to total mercury was calculated. Results indicated that methyl mercury was less than 1% of total mercury (**Table 3-9**).

3.2.2 AVS/SEM

AVS/SEM data were collected to better assess whether inorganic substances are potential stressors of concern in sediments (**Table 3-10**). These analyses indicate the bioavailability of selected divalent metals to benthic organisms in the BAZ of the sediment. Surficial (0- to 0.5-foot) samples were collected to minimize the potential influence of deeper anoxic sediments on this measure of bioavailability.

The appropriate analytical measurement of metals used to calculate the metals: AVS ratio is known as the Simultaneously Extracted Metals (SEM) concentration. The SEM concentration represents the metals extracted in the AVS analytical procedure recommended by USEPA. Recent USEPA guidance (USEPA 2005) suggests using the difference (SEM minus AVS) for evaluation of metals bioavailability in sediments, where differences greater than zero suggest excess metals that may be bioavailable. Organic carbon can impact bioavailability, and normalization of the differences provides another evaluation of potential bioavailability, and reduces the uncertainty associated with the prediction. When normalized to the fraction of organic carbon (foc) in the sample, (SEM-AVS)/foc less than 130 micromoles/per gram - organic carbon (umol/g-oc) is unlikely to pose toxicity, and values greater than 3,000 umol/g-oc is likely to pose toxicity (USEPA 2005).

3.2.3 TPH Purgeables

TPH Purgeables were analyzed to provide a complete characterization of petroleum related contaminants, especially the gasoline range components that are not captured by the Method 8260 VOC analyte list or extractable TPH. Results are presented in the detailed data tables of **Appendix O**. All analyses were ND with the exception of 2008-CLRC-100, which is located above Dundee Dam.

3.2.4 Cr(VI)

The purpose of analyzing for Cr(VI) was to determine its presence in surface sediment for future analysis and risk assessment purposes. Results are presented in the detailed data tables of **Appendix O**. Six analyses reported detected concentrations, two were ND and two analyses were rejected (the reason for rejection is discussed in Chapter 4.0). It is expected that Cr(VI) is a very minor contributor to sediment risk, and additional characterization is not considered a data need for the completion of the risk assessment.

3.2.5 Nutrients

Phosphorus, ammonia and TKN were analyzed at the Group B locations. Analytical data is summarized in **Appendix O**.

3.3 Group C

In addition to the analytes in Group A, particle size-density classification, microscopy, and petrography were evaluated to support a PCB sediment-water partitioning study. Surficial (0- to 0.5-foot) samples were evaluated from six stations.

There were two goals of the partitioning study: 1) to develop data for establishing and evaluating the potential significance of a project-specific method for quantifying the sediment/pore water partitioning coefficients for PCBs; and 2) to conduct a preliminary survey of the site-specific PCB aqueous

partitioning coefficients in sediment samples collected from the three different geochemical regimes of the Passaic River (soft organic sediments downgradient from the salt water front, sediments in the transition zone between fresh and salt water, and hard sediments in the freshwater reach below the Dundee Dam). The physical nature of the organic carbon was characterized and the aqueous partitioning coefficient for PCBs was calculated for each of the six sediment samples. The results of the partitioning study will be submitted under separate cover.

3.4 Group D

In addition to the samples/analytes in Group A, 2-foot, finely segmented cores were collected at eight locations to support development of the sediment transport and chemical fate and transport models. The cores were analyzed for grain size, bulk density, TOC, PCDD/Fs, PCBs, PAHs, pesticides, mercury, metals, SVOC, CN, and herbicides (see Section 2.8.3). These cores were collected to characterize fine-scale variation in the surficial sediment concentrations. Evaluation of the Group D analytes may be used to determine what benefit, if any, may be derived from the fine-segmentation of the surficial sediments, using 0.1- to 0.3-foot intervals, compared to the low resolution segmentation of the Group A cores with 0.5-foot intervals. **Table 3-11** presents a comparison of the subset of analytes in Group D and the colocated Group A (low resolution) cores on a dry weight basis, and **Table 3-12** presents these data normalized to TOC.

Figures 3-8.a through **3-8.m** present a comparison of colocated Group A and Group D analyte concentrations. The subset of analytes and parameters included in these figures is presented in **Table 3-1**. Chemical concentrations are presented on a dry weight basis. The plots are presented on linear or log concentration scales depending on the range of observed concentrations to facilitate comparison.

Table 3-1 Selected LRC Analytes and Physical Parameters for Presentation of Results

Analyte	Units	Notes
2,3,7,8 – TCDD	nanogram per kilogram (ng/kg)	As directed by EPA, the dioxin data were adjusted per the recommendations in the CSC Report (CSC 2011): If a sample had a split sample, the split sample result is reported. For other samples, results below the Quantitation Limit (QL) are reported as-is, and results above the QL were multiplied by the correction factor. If ND, the numerical value associated with the detection limit (DL) was reported.
Total TEQ PCDD TEQ, PCDF TEQ, PCDD- PCB TEQ	ng/kg	The sum of the TEFs from the latest EPA report (USEPA 2010a) multiplied by detects for the individual group analytes for which TEFs are reported; if all ND, reported as the numerical value associated with the highest individual analyte DL.
Total PCBs Congeners and Aroclors	mg/kg	The sum of all PCB congener (Method 1668A) detects and the sum of all PCB Aroclors; if all ND, reported as the numerical value associated with the highest individual analyte DL.
Total High Molecular Weight (HMW) PAH by HRGC/LRMS-SIM	mg/kg	The sum of 10 PAH compounds (by HRGC/LRMS-SIM method) with molecular weights greater than 200 gram/mole: Benzo[a]anthracene, Benzo[a]pyrene, Benzo[b]fluoranthene, Benzo[g,h,i]perylene, Benzo[k]fluoranthene, Chrysene, Dibenz[a,h]anthracene, Fluoranthene, Indeno[1,2,3-cd]pyrene, and Pyrene detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.
Total Low Molecular Weight (LMW) PAH by HRGC/LRMS-SIM	mg/kg	The sum of six PAH compounds (by HRGC/LRMS-SIM method): Acenaphthene, Acenaphthylene, Anthracene, Fluorene, Naphthalene, and Phenanthrene detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.
Total DDx (the sum of the DDD, DDE, DDT isomers)	mg/kg	The sum of the 4,4"-DDD, 4,4"-DDE, and 4,4"-DDT (by HRGC/HRMS method) detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.
Total PAHs	mg/kg	
Dieldrin	mg/kg	If ND, the numerical value associated with the DL was reported.
Total Chlordane	mg/kg	The sum of cis-Chlordane, oxy-Chlordane, trans-Chlordane, cis-Nonachlor, trans-Nonachlor detects. If all ND, reported as the highest individual analyte DL.
Mercury	mg/kg	If ND, the numerical value associated with the DL was reported.
Cadmium	mg/kg	If ND, the numerical value associated with the DL was reported.
Copper	mg/kg	If ND, the numerical value associated with the DL was reported.
Lead	mg/kg	If ND, the numerical value associated with the DL was reported.
TOC	%	
Percent fines	%	Percent passing Sieve #230; implied sum of silt and clay grain size fractions.

Table 3-2a Highest Surficial (0-0.5 ft) Sediment Concentrations for Selected Chemical Analytes¹

Analyte	Location 2008-CLRC-	River Mile	Mid-depth (ft)	Result ⁶	Units
2,3,7,8-TCDD	045	7.0	0.25	13500	ng/kg
Total TEQ ⁷	045	7.0	0.25	13900	ng/kg
Total PCBs ²	045	7.0	0.25	18.9	mg/kg
Total HMW PAHs ³	103	17.7	0.25	542	mg/kg
Total LMW PAHs ⁴	104	18.4	0.25	545	mg/kg
Total DDx ⁵	062	10.0	0.25	0.93	mg/kg
Dieldrin	047	7.5	0.25	0.152	mg/kg
Total Chlordane	076	12.8	0.25	0.435	mg/kg
Lead	045	7.0	0.25	763	mg/kg
Mercury	045	7.0	0.25	13.4	mg/kg
Cadmium	045	7.0	0.25	29.9	mg/kg
Copper	045	7.0	0.25	577	mg/kg

Table 3-2b Highest Sediment Concentrations for Selected Chemical Analytes (All Depths)¹

Analyte	Location 2008-CLRC-	River Mile	Mid-depth (ft)	Result ⁶	Unit
2,3,7,8-TCDD	021	1.9	4.5	238000	ng/kg
Total TEQ ⁷	021	1.9	4.5	238000	ng/kg
Total PCBs ²	008	0.4	14.5	133	mg/kg
Total HMW PAHs ³	098	17.5	4.5	1100	mg/kg
Total LMW PAHs ⁴	098	17.5	4.5	1450	mg/kg
Total DDx ⁵	024	2.6	6.5	14	mg/kg
Dieldrin	015	1.1	6.5	1	mg/kg
Total Chlordane	076	12.8	0.25	0.435	mg/kg
Lead	015	1.1	6.5	1310	mg/kg
Mercury	073	12.3	1	42.1	mg/kg
Cadmium	062	10.0	2	56.8	mg/kg
Copper	022	2.6	3	1040	mg/kg

Notes:

¹ Considers core analytical data only; grab samples and finer segmentation samples are not included in this summary.

² The sum of all PCB congener (Method 1668A) detects; if all ND, reported as the numerical value associated with the highest individual congener DL.

³ The sum of 10 PAH compounds (by HRGC/LRMS-SIM method) with molecular weights greater than 200 gram/mole: Benzo[a]anthracene, Benzo[a]pyrene, Benzo[b]fluoranthene, Benzo[g,h,i]perylene, Benzo[k]fluoranthene, Chrysene, Dibenzo[a,h]anthracene, Fluoranthene, Indeno[1,2,3-cd]pyrene, and Pyrene detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.

⁴ The sum of six PAH compounds (by HRGC/LRMS-SIM method): Acenaphthene, Acenaphthylene, Anthracene, Fluorene, Naphthalene, and Phenanthrene detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.

⁵ The sum of the 4,4'-DDD, 4,4'-DDE, and 4,4'-DDT (by HRGC/HRMS method) detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.

⁶ All data presented have been validated. Data qualifiers are presented in **Appendix O** for all samples and analytes.

⁷ The sum of the TEFs from the latest EPA report (USEPA 2010a) multiplied by detects for the individual group analytes for which TEFs are reported; if all ND, reported as the numerical value associated with the highest individual analyte DL.

Table 3-3 Ten Highest Surficial (0-0.5 ft) Concentrations for Selected Analytes¹

Analyte Unit	2,3,7,8-TCDD ng/kg			Total TEQ ⁷ ng/kg			Total PCBs ² mg/kg			Total HMW PAHs ³ mg/kg			Total LMW PAHs ⁴ mg/kg			Total DDx ⁵ mg/kg		
Rank	Location 2008-CLRC-	River Mile	Result ⁶	Location 2008-CLRC-	River Mile	Result ⁶	Location 2008-CLRC-	River Mile	Result ⁶	Location 2008-CLRC-	River Mile	Result ⁶	Location 2008-CLRC-	River Mile	Result ⁶	Location 2008-CLRC-	River Mile	Result ⁶
1	045	7	3500	045	7	13900	045	7	18.9	103	17.73	542	104	18.37	545	062	10.02	0.93
2	067	10.93	6490	067	10.93	6640	076	12.79	8.86	104	18.37	522	103	17.73	453	045	7	0.817
3	043	7	2470	043	7	2550	057	8.99	8.33	098	17.46	315	115	4.21	215	076	12.79	0.568
4	115	4.21	2090	115	4.21	2250	029	3.53	7.01	115	4.21	266	098	17.46	86.6	057	8.99	0.517
5	029	3.53	2000	029	3.53	2120	101	17.61	5.11	076	12.79	209	031	4.25	82.5	051	7.97	0.439
6	069	11.51	1750	069	11.51	1810	115	4.21	4.89	079	13.58	156	079	13.58	63.1	047	7.45	0.413
7	040	6.49	1360	040	6.49	1450	040	6.49	2.51	019	1.47	122	086	15.07	59.7	019	1.47	0.41
8	022	2.64	1340	022	2.64	1430	077	12.84	2.41	031	4.25	82.3	076	12.79	31.9	023	2.62	0.35
9	011	0.54	1050	011	0.54	1130	024	2.62	2.31	021	1.94	65.6	019	1.47	20.6	115	4.21	0.334
10	055	8.44	896	055	8.44	980	047	7.45	2.19	064	10.55	56.8	064	10.55	16.2	101	17.61	0.306
Analyte Unit	Dieldrin mg/kg			Total Chlordane mg/kg			Lead mg/kg			Mercury mg/kg			Cadmium mg/kg			Copper mg/kg		
Rank	Location 2008-CLRC-	River Mile	Result ⁶	Location 2008-CLRC-	River Mile	Result ⁶	Location 2008-CLRC-	River Mile	Result ⁶	Location 2008-CLRC-	River Mile	Result ⁶	Location 2008-CLRC-	River Mile	Result ⁶	Location 2008-CLRC-	River Mile	Result ⁶
1	047	7.45	0.152	076	12.79	0.435	045	7	763	045	7	13.4	045	7	29.9	045	7	577
2	045	7	0.13	047	7.45	0.354	073	12.3	641	101	17.61	10.4	115	4.21	15.9	062	10.02	460
3	101	17.61	0.061	019	1.47	0.322	115	4.21	599	62	10.02	9.31	040	6.49	15.7	073	12.3	382
4	76	12.79	0.043	042	6.5	0.244	090	15.63	535	057	8.99	9.3	062	10.02	13.2	040	6.49	366
5	114	9.6	0.031	060	9.57	0.21	40	6.49	526	115	4.21	6.03	069	11.51	11.7	115	4.21	361
6	019 064	1.47 10.55	0.025 0.025	058	9.42	0.189	107	8.03	505	085	14.81	5.5	057	8.99	8.18	057	8.99	306
7				021	1.94	0.186	069	11.51	458	002	0	4.94	67	10.93	6.22	048	7.44	301
8	042 040	6.5 6.49	0.024 0.024	064	10.55	0.178	062	10.02	446	48'0	7.44	4.31	030	4.25	6.08	044	7	265
9				67	10.93	0.177	055	8.44	410	003	0.22	4.03	077	12.84	5.51	030	4.25	264
10	098	17.46	0.021	110	11.21	0.175	057	8.99	387	077 073	12.84 12.3	3.18 3.18	024	2.62	5.41	069	11.51	241

Notes:

¹ Considers core analytical data only; grab samples and finer segmentation samples are not included in this summary.

² The sum of all PCB congener (Method 1668A) detects; if all ND, reported as the numerical value associated with the highest individual congener DL.

³ The sum of 10 PAH compounds (by HRGC/LRMS-SIM method) with molecular weights greater than 200 gram/mole: Benzo[a]anthracene, Benzo[a]pyrene, Benzo[b]fluoranthene, Benzo[g,h,i]perylene, Benzo[k]fluoranthene, Chrysene, Dibenz[a,h]anthracene, Fluoranthene, Indeno[1,2,3-cd]pyrene, and Pyrene detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.

⁴ The sum of six PAH compounds (by HRGC/LRMS-SIM method): Acenaphthene, Acenaphthylene, Anthracene, Fluorene, Naphthalene, and Phenanthrene detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.

⁵ The sum of the 4,4'-DDD, 4,4'-DDE, and 4,4'-DDT (by HRGC/HRMS method) detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.

⁶ All data presented have been validated. Data qualifiers are presented in **Appendix O** for all samples and analytes.

⁷ The sum of the TEFs from the latest EPA report (USEPA 2010a) multiplied by detects for the individual group analytes for which TEFs are reported; if all ND, reported as the numerical value associated with the highest individual analyte DL.

Table 3-4 Ten Highest Concentrations for Selected Analytes¹ (All Depths)

Analyte Unit	2,3,7,8-TCDD ng/kg				Total TEQ ⁷ ng/kg				Total PCBs ² mg/kg				Total HMW PAHs ³ mg/kg			
Rank	Location 2008-CLRC-	River Mile	Mid-depth (ft)	Result ⁶	Location 2008-CLRC-	River Mile	Mid-depth (ft)	Result ⁶	Location 2008-CLRC-	River Mile	Mid-depth (ft)	Result ⁶	Location 2008-CLRC-	River Mile	Mid-depth (ft)	Result ⁶
1	021	1.94	4.5	238000	021	1.94	4.5	238000	008	0.37	14.5	133	098	17.46	4.5	1100
2	023	2.62	10.5	127000	023	2.62	10.5	127000	018	1.47	4.5	35.7	104	18.37	8.5	686
3	115	4.21	3	112000	115	4.21	3	113000	045	7	1	33	104	18.37	6.5	591
4	036	5.51	7.735	87400	036	5.51	7.735	87600	056	8.98	4.5	25.4	101	17.61	6.5	552
5	021	1.94	6.5	58500	021	1.94	6.5	59700	056	8.98	8.5	25.2	103	17.73	0.25	542
6	067	10.93	1	57200	067	10.93	1	58000	027	3.52	10.5	24.8	104	18.37	0.25	522
7	045	7	1	50400	045	7	1	51400	056	8.98	6.5	24.3	098	17.46	7.725	430
8	056	8.98	8.5	34200	056	8.98	8.5	34700	115	4.21	1	21.9	033	5	4.65	421
9	040	6.49	2	32100	040	6.49	2	32300	008	0.37	15.865	21.7	104	18.37	4.5	405
10	024	2.62	4.5	28500	024	2.62	4.5	29200	032	4.25	4.5	19	026	3.17	2.05	401
Analyte Unit	Total LMW PAHs ⁴ mg/kg				Total DDx ⁵ mg/kg				Dieldrin mg/kg				Total Chlordane mg/kg			
Rank	Location 2008-CLRC-	River Mile	Mid-depth (ft)	Result ⁶	Location 2008-CLRC-	River Mile	Mid-depth (ft)	Result ⁶	Location 2008-CLRC-	River Mile	Mid-depth (ft)	Result ⁶	Location 2008-CLRC-	River Mile	Mid-depth (ft)	Result ⁶
1	098	17.46	4.5	1450	024	2.62	6.5	14	015	1.11	6.5	1	076	12.79	0.25	0.435
2	104	18.37	6.5	963	023	2.62	10.5	9.8	045	7	1	0.24	082	14.09	10.5	0.413
3	104	18.37	8.5	933	022	2.64	3	7.8	056	8.98	8.5	0.22	038	6	3	0.374
4	101	17.61	6.5	874	023	2.62	12.5	6.25	047	7.45	0.25	0.152	084	14.22	2	0.369
5	098	17.46	7.725	777	024	2.62	4.5	5.26	057	8.99	3	0.14	084	14.22	3	0.362
6	104	18.37	4.5	663	039	6.27	6.5	5.06	008 023 056 045	0.37 2.62 8.98 7	14.5 8.5 10.675 0.25	0.13 0.13 0.13 0.13	078	13.23	7.8	0.361
7	104	18.37	0.25	545	021	1.94	8.5	4.25					078	13.23	6.5	0.355
8	031	4.25	2	508	030	4.25	4.5	4.24					047	7.45	0.25	0.354
9	103	17.73	0.25	453	030	4.25	6.5	4.01					084	14.22	6.5	0.337
10	033	5	4.65	435	027	3.52	12.5	3.98	115	4.21	2	0.12	084	14.22	4.5	0.329

Table 3-4 Ten Highest Concentrations for Selected Analytes¹ (All Depths) (Continued)

Analyte Unit	Lead mg/kg				Mercury mg/kg				Cadmium mg/kg				Copper mg/kg			
Rank	Location 2008-CLRC-	River Mile	Mid-depth (ft)	Result ⁶	Location 2008-CLRC-	River Mile	Mid-depth (ft)	Result ⁶	Location 2008-CLRC-	River Mile	Mid-depth (ft)	Result ⁶	Location 2008-CLRC-	River Mile	Mid-depth (ft)	Result ⁶
1	015	1.11	6.5	1310	073	12.3	1	42.1	062	10.02	2	56.8	022	2.64	3	1040
2	104	18.37	4.5	1170	056	8.98	6.5	27.3	045	7	3	41.6	062	10.02	3	829
3	008	0.37	14.5	1130	045	7	2	26.4	085 030	14.81 4.25	4.5 4.5	40.6 40.6	030	4.25	4.5	827
4	101	17.61	6.5	1080	069	11.51	1	24.6					062	10.02	2	757
5	098	17.46	4.5	1050	009	0.46	12.05	23.3	069	11.51	1	40.5	045	7	12.25	752
6	048	7.44	2	1040	056	8.98	4.5	20.1	045	7	2	40	045	7	3	731
7	101	17.61	4.5	1000	027	3.52	10.5	19.9	032	4.25	6.5	37.9	028	3.53	6.5	720
8	036	5.51	2	1000	030	4.25	4.5	19.7	027	3.52	12.5	34.8	030	4.25	3	716
9	022	2.64	2	936	067	10.93	1	19	027	3.52	10.5	34.1	115	4.21	6.5	714
10	056	8.98	4.5	897	020	1.47	4.5	18.2	030	4.25	3	33.6	115	4.21	3	709

Notes:

- ¹ Considers core analytical data only; grab samples and finer segmentation samples are not included in this summary.
- ² The sum of all PCB congener (Method 1668A) detects; if all ND, reported as the numerical value associated with the highest individual congener DL.
- ³ The sum of 10 PAH compounds (by HRGC/LRMS-SIM method) with molecular weights greater than 200 gram/mole: Benzo[a]anthracene, Benzo[a]pyrene, Benzo[b]fluoranthene, Benzo[g,h,i]perylene, Benzo[k]fluoranthene, Chrysene, Dibenz[a,h]anthracene, Fluoranthene, Indeno[1,2,3-cd]pyrene, and Pyrene detects; if all ND, as the numerical value associated with the highest individual analyte DL.
- ⁴ The sum of six PAH compounds (by HRGC/LRMS-SIM method): Acenaphthene, Acenaphthylene, Anthracene, Fluorene, Naphthalene, and Phenanthrene detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.
- ⁵ The sum of the 4,4'-DDD, 4,4'-DDE, and 4,4'-DDT (by HRGC/HRMS method) detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.
- ⁶ All data presented have been validated. Data qualifiers are presented in **Appendix O** for all samples and analytes.
- ⁷ The sum of the TEFs from the latest EPA report (USEPA 2010a) multiplied by detects for the individual group analytes for which TEFs are reported; if all ND, reported as the numerical value associated with the highest individual analyte DL.

Table 3-5 Depth of Highest Concentration for Selected Chemical Analytes for Each LRC Location

Location 2008-CLRC	River Mile	Cesium-137		2,3,7,8-TCDD		Total TEQ HH		Total PCB ²		Total HMW PAHs ³		Total LMW PAHs ⁴		Total DDX ⁵		Dieldrin		Total Chlordane		Lead		Mercury		Cadmium		Copper	
		Maximum pCi/g	Mid-depth ⁶ ft	Maximum ng/kg	Mid-depth ⁶ ft	Maximum ng/kg	Mid-depth ⁶ ft	Maximum mg/kg	Mid-depth ⁶ ft	Maximum mg/kg	Mid-depth ⁶ ft	Maximum mg/kg	Mid-depth ⁶ ft	Maximum mg/kg	Mid-depth ⁶ ft	Maximum mg/kg	Mid-depth ⁶ ft	Maximum mg/kg	Mid-depth ⁶ ft	Maximum mg/kg	Mid-depth ⁶ ft	Maximum mg/kg	Mid-depth ⁶ ft	Maximum mg/kg	Mid-depth ⁶ ft	Maximum mg/kg	Mid-depth ⁶ ft
001	-0.15	0.193	8.5	402	14.5		14.5	1.21	16.5	12.3	12.5	3.05	12.5	0.0716	1	0.0018 0.0018	12.5 1	0.0194	12.5	209	10.5	4.24	16.5	3.6	16.5	191	10.5
4	-0.03	0.310	18.3	1530	18.3	1730	18.3	10.1	18.3	34.4	18.3	24.6	18.3	0.752	12.5	0.02	18.3	0.0641	18.3	527	18.3	17.1	18.3	13	18.3	339	18.3
2	0	< 0.00593	0.25	< 0.833	0.25	1.24	2	0.0119	0.25	64.6	1	33.9	1	0.00330	0.25	< 0.000082	4.5	< 0.000270	6.125	359	1	8.69	1	1.12	1	332	1
5	0.15	0.278	10.5	893	10.5	1120	10.5	4.26	10.5	30.7	1	6.29	10.5	0.319	1	0.019	1	0.241	1	458	10.5	12.3	10.5	11.5	10.5	286	10.5
5	0.16																										
3	0.22	0.135	0.25	1020	1	1060	1	1.23	0.25	60.8	2	14.4	2	0.0356	0.25	0.0013	0.25	0.00670	0.25	380	2	6.11	2	2.71	1	286	2
6	0.35	0.173	1	387	2	496	2	1.2	2	9.32	0.25	1.39	0.25	0.0326	2	0.0012	0.25	0.0155	0.25	204	2	2.91	2	3.5	2	165	2
8	0.37	0.227	12.5	1980	14.5	2680	14.5	133	14.5	27.9	14.5	52.1	14.5	2.31	15.865	0.13	14.5	0.104	14.5	1130	14.5	8.93	15.865	12.7	14.5	467	14.5
7	0.41	0.190	1	370	1	464	1	1.21	2	8.89	0.25	1.42	0.25	0.0327	1	0.0015	0.25	0.0162	0.25	197	2	3	2	3.59	2	164	2
9	0.46	0.349	10.5	945	10.5	1150	10.5	5.39	12.05	33.5	10.5	12.7	10.5	0.257	12.05	0.012	12.05	0.142	10.5	542	12.05	23.3	12.05	13.5	12.05	382	12.05
9	0.47																										
11	0.54	0.112	0.25	1050	0.25	1130	0.25	1.04	0.25	7.22	0.25	1.4	0.25	0.0516	0.25	0.0024	0.25	0.0178	0.25	152	0.25	2.8	0.25	2.87	0.25	128	0.25
10	0.63	0.389	16.5	944	18.5	1230	18.5	6.88	20.625	35.7	0.25	10.3	20.625	0.268	20.625	0.015	20.625	0.207	16.5	664	20.625	16.4	20.625	16.8	20.625	484	20.625
12	0.66	0.264	13.915	1230	8.5	1360	8.5	3.15	13.915	8.01	1	1.41 1.41	1 13.915	0.382	12.5	0.0027	12.5	0.0340	13.915	812	12.5	7.53	13.915	16.9	12.5	690	12.5
13	0.74	0.403	14.5	1190	14.5	1480	14.5	8.93	14.5	28.3	0.25	10	14.5	0.411	14.5	0.017	14.5	0.141	14.5	677	14.5	16.1	14.5	15.1	14.5	440	14.5
14	1.03	0.379	3	1550	8.5	1790	8.5	12.3	6.5	59.9	8.5	50.8	14.5	1.97	8.5	0.058	6.5	0.138	4.5	627	8.5	16.7	8.5	18.9	8.5	649	8.5
17	1.07	0.319	10.5	5680	12.5	6120	12.5	7.19	12.5	79	20.6	64.9	20.6	0.567	12.5	0.022	12.5	0.0860	14.5	688	20.6	12.4	12.5	16.8	12.5	661	20.6
15	1.11	0.269	3	825	6.5	1170	6.5	16.8	6.5	65.7	2	19.3	2	0.26	6.5	1	6.5	0.0822	6.5	1310	6.5	7.36	6.5	6.83	6.5	236	6.5
16	1.11	0.512	18.31	2980	16.5	3380	16.5	7.19	18.31	35.2	1	11.8	18.31	0.297	18.31	0.019	18.31	0.243	18.31	584	18.31	8.02	16.5	12.9	18.31	373	18.31
18	1.47	0.374	3	2640	4.5	3550	4.5	35.7	4.5	64.5	6.5	32.6	6.5	1.19	4.5	0.051	4.5	0.24	4.5	593	2.84	13.7	3	14.5	2.84	503	2.84
19	1.47	0.370	3	816	2	1010	2	5.4	3.75	122	0.25	20.6	0.25	0.41	0.25	0.025	0.25	0.322	0.25	657	4.385	14.5	3.75	13.4	4.385	409	4.385
20	1.47	0.545	4.5	6550	4.5	6990	4.5	14	4.5	74.7	10.5	45	10.5	1.70	6.5	0.053	4.5	0.115	2			18.2	4.5	24.8	6.5	680	6.5
21	1.94	0.595	3	238000	4.5	238000	4.5	12	3	68.7	8.5	32.6	8.5	4.25	8.5	0.045	4.5	0.186	0.25	672	8.5	14.5	8.5	22.4	6.5	694	8.5
23	2.62	1.02	6.5	127000	10.5	127000	10.5	18.5	8.5	118	14.375	72.6	14.375	9.8	10.5	0.13	8.5	0.166	6.5	688	10.5	12.3	8.5	28.6	12.5	649	12.5
24	2.62	0.710	2	28500	4.5	29200	4.5	15.1	2	65	6.5	29.3	8.5	14	6.5	0.11	4.5	0.104	2	600	6.39	17.6	3	25.2	4.5	569	3
22	2.64	0.331	2	8830	3	9340	3	17.1	3	211	3	24.5	3	7.8	3	0.034	3	0.216	2	936	2	10	2	8.26	2	1040	3
25	2.85	1.02	4.5	14900	6.5	15400	6.5	12.9	4.5	106	8.1	44.1	8.1	1.85	6.5	0.063	4.5	0.205	3	687	8.1	13.1	6.5	25.9	6.5	609	8.1
26	3.17	0.228	1	640	1	855	1	8.71	2.05	401	2.05	122	2.05	1.19	2.05	0.0044	2.05	0.0616	2.05	542	1.95	9.71	2.05	11.7	1.95	407	1.95
27	3.52	0.991	10.5	14600	8.5	14900	8.5	24.8	10.5	103	12.5	56.3	12.5	3.98	12.5	0.087	10.5	0.193	6.5	740	6.5	19.9	10.5	34.8	12.5	690	10.5
28	3.53	0.872	6.5	26000	6.5	26600	6.5	9.85	6.5	215	8.3	173	8.3	1.39	6.5	0.048	6.5	0.192	4.5	712	6.5	12.5	6.5	18.7	6.5	720	6.5
29	3.53	0.766	1	25600	2	25900	2	7.81	1	212	8.125	236	8.125	2.16	4.5	0.021	1	0.0930	1	664	8.125	13.5	2	28	2	616	8.125
115	4.21	0.916	3	112000	3	113000	3	21.9	1	266	0.25	215	0.25	2.37	4.5	0.12	2	0.152	3	880	4.5	14.3	3	32.7	1	714	6.5
32	4.24																										
30	4.25	0.697	3	19100	2	19400	2	18.8	2	213	8.115	206															

Table 3-5 Depth of Highest Concentration for Selected Chemical Analytes for Each LRC Location (Continued)

Location 2008-CLRC	River Mile	Cesium-137		2,3,7,8-TCDD		Total TEQ HH		Total PCB ²		Total HMW PAHs ³		Total LMW PAHs ⁴		Total DDX ⁵		Dieldrin		Total Chlordane		Lead		Mercury		Cadmium		Copper		
		Maximum	Mid-depth ⁶	Maximum	Mid-depth ⁶	Maximum	Mid-depth ⁶	Maximum	Mid-depth ⁶	Maximum	Mid-depth ⁶	Maximum	Mid-depth ⁶	Maximum	Mid-depth ⁶	Maximum	Mid-depth ⁶	Maximum	Mid-depth ⁶	Maximum	Mid-depth ⁶	Maximum	Mid-depth ⁶	Maximum	Mid-depth ⁶	Maximum	Mid-depth ⁶	
		pCi/g	ft	ng/kg	ft	ng/kg	ft	mg/kg	ft	mg/kg	ft	mg/kg	ft	mg/kg	ft	mg/kg	ft	mg/kg	ft	mg/kg	ft	mg/kg	ft	mg/kg	ft	mg/kg	ft	
59	9.5					0.0101	0.25	0.00612	0.25	0.634	0.25	0.139	0.25							33.3	0.25	0.0178	0.25	0.31	0.25	17.2	0.25	
60	9.57	0.368	3	2550	3	2680	3	1.71	3	46.1	0.25	6.96	0.25	0.132	3	0.0123	0.25	0.21	0.25	328	2	4.7	3	6.16	2	255	2	
114	9.6	0.695	0.25	847	0.25	909	0.25	0.723	0.25	11.9	0.25	2.37	0.25	0.269	0.25	0.031	0.25	0.156	0.25	228	0.25	2.3	0.25	3.16	1	101	1	
62	10.02	0.0495	0.25	29.2	0.25	321	2	1.8	2	64.9	6.4	19.7	6.4	0.93	0.25	0.0024	0.25	0.0282	0.25	837	3	14.5	2	56.8	2	829	3	
61	10.03	0.0414	0.25	98.5	0.25	112	0.25	0.77	0.25	44.8	0.25	9.99	0.25	0.0722	0.25	0.0040	0.25	0.0203	0.25	340	0.25	1.59	0.25	6.12	2	60.3	0.25	
63	10.27	0.385	1	1190	1	1350	1	2.88	2.05	37.1	2.05	7.79	2.05	0.12	2.05	0.0066	0.25	0.0981	2.05	376	1.85	3.99	1	7.33	1.85	269	1.85	
64	10.55	0.102	0.25	215	0.25	262	0.25	1.64	0.25	56.8	0.25	16.2	0.25	0.235	0.25	0.025	0.25	0.178	0.25	240	0.25	1.34	0.25	2.7	0.25	61.4	0.25	
65	10.55	0.162	0.25	470	1	530	1	0.916	1	15.7	0.25	4.93	1	0.0600	1	0.0038	0.25	0.0924	0.25	182	0.25	5.04	1	3.78	1	131	1	
66	10.93	0.0611	2	38.3	2	51.7	2	1.62	2	110	3	33.5	3	0.0215	2	< 0.0013	2	0.0153	0.25	342	1	0.977	3	1.08	3	42.9	3	
67	10.93	2.25	1	57200	1	58000	1	18	1	42.3	1	8.72	1	0.525	1	0.0254	1	0.177	0.25	652	1	19	1	24.1	1	473	1	
108	11.21	0.0627	0.25	< 1.93	0.25	16.0	0.9	0.139	0.9	15.6	0.9	2.47	0.25	0.0760	0.25	0.011	0.25	0.121	0.25	92.1	1	0.11	0.9	0.577	0.25	64.5	1	
109	11.21	< -0.00583	5	0.467	0.25	2.28	0.25	0.00318	0.25	0.00620	0.25	0.0160	3	0.000436	0.25	< 0.000053	0.25	0.000654	0.25	112	0.25	0.118	0.25	1.2	0.25	38	0.25	
110	11.21	0.175	2	144	0.25	164	0.25	0.459	3	28.8	0.25	4.55	0.25	0.169	2	0.0094	0.25	0.206	2	228	2	0.645	1	1.96	2	67.3	2	
68	11.32	0.252	0.25	1480	1	1590	1	2.57	1	46.8	1	9.3	1	0.28	2	0.0041	0.25	0.107	1	552	1	3.1	2	19	1	404	1	
69	11.51	0.0936	0.25	11900	1	12100	1	1.53	1	65.8	2	15	1	2.22	1	0.0062	0.25	0.0647	0.25	734	1	24.6	1	40.5	1	594	1	
70	11.51	0.0832	4.355	528	4.355	550	4.355	0.906	4.355	11.5	4.355	2.29	2	0.216	0.25	0.01	0.25	0.0638	0.25	220	2	1.29	4.355	1.87	4.355	244	4.355	
71	11.98	0.0526	0.25	30.6	1	32.6	1	0.0994	0.25	7.87	1	5.6	0.25	0.0128	0.25	0.0020	0.25	0.0221	0.25	173	0.25	0.957	2	1.56	0.25	60.9	2	
72	12.03	0.0227	0.25	59.4	0.25	64.9	0.25	0.12	0.25	7.34	0.25	1.21	0.25	0.0204	0.25	< 0.0013	0.25	0.0128	0.25	31.4	0.25	0.318	0.25	0.259	0.25	31.4	0.25	
73	12.3	0.317	1	1220	1	1380	1	1.89	0.25	29.6	2.1	6	2.1	0.122	1	0.0038	0.25	0.136	1	641	0.25	42.1	1	6.31	1	382	0.25	
74	12.56	0.515	8.175	3000	8.175	3150	8.175	4.36	8.175	38	1	8.27	3	0.172	6.5	0.025	8.175	0.212	6.5	583	6.5	4.91	6.5	9.61	6.5	320	6.5	
75	12.56	0.073	1.05	67.4	1.05	74.9	1.05	0.239	1.05	12.9	0.25	2.32	0.25	0.0460	0.25	0.0063	0.25	0.0473	0.25	118	0.25	0.394	1.05	0.879	1.05	40.1	0.25	
76	12.79	0.147	0.25	296	0.25	347	0.25	8.86	0.25	209	0.25	31.9	0.25	0.568	0.25	0.043	0.25	0.435	0.25	103	0.25	2.75	0.25	0.663	0.25	54.6	0.25	
77	12.84	1.09	2	19200	2	19600	2	13.9	2	33	2	6.61	2	0.36	2	0.055	2	0.101	2	514	2	9.79	2	18.8	2	441	2	
78	13.23	0.383	4.5	568	7.8	690	7.8	6.27	7.8	71.4	6.5	23.5	6.5	0.389	7.8	0.071	7.8	0.361	7.8	489	3	4.32	3	6.97	3	218	3	
79	13.58	0.178	4.5	63	4.5	82.5	4.5	1.27	2	192	2	63.1	0.25	0.0695	3	0.0052	3	0.106	3	443	2	1.14	2	2.9	2.72	111	2.72	
80	13.58	0.112	4.465	192	4.465	207	4.465	1.02	3	24.8	0.25	9.33	0.25	0.0789	0.25	0.0024	4.465	0.0649	0.25	218	3	1.13	3	2.46	3	79.8	3	
80	13.59																											
81	14.09	0.0517	2	0.817	0.25	6.51	0.25	0.324	2	15.9	2	5.06	2	0.0319	2	0.013	2.8	0.0406	2.8	305	1	0.283	2.8	0.549	2	28.5	2	
82	14.09	0.502	10.5	217	10.5	329	10.5	3.17	10.5	67.1	4.5	16.9	4.5	0.209	10.5	0.025	14.5	0.413	10.5	648	10.5	2.93	10.5	6.3	12.5	188	10.5	
83	14.21	0.0744	0.25	0.615	3	6.23	3	0.139	3.82	9.1	3	3.11	3	0.0769	1	0.0034	3	0.0309	3	180	0.25	0.165	0.25	0.45	3	57.4	1	
118	14.21	0.087	0.25	0.25	1	5.42	1	0.0727	1	9.39	0.25	1.7	0.25	0.0165	0.25	0.0036	0.25	0.0318	0.25	159	0.25	9.61	1	0.335	0.25			
84	14.22	0.716	2	65.1	8.65	196	6.5	3.78	6.5	53.5	3	14.5	3	0.182	6.5	0.022	6.5	0.369	2	765	4.5	3.14	6.5	6.21	6.5	188	6.5	
85	14.81	0.232	2	39.6	4.5	132	4.5	1.02	8.5	155	6.5	71.3	8.5	2.3	12.5	0.0074	3	0.124	2	460	8.5	17.6	4.5	40.6	4.5	306	8.5	
86	15.07	0.0279	0.25	< 0.486	0.25	4.72	0.25	0.135	0.25	51.6	0.25	59.7	0.25	0.00859	0.25	0.0023	0.25	0.0148	0.25	76.2	0.25	0.432	0.25	0.461	0.25	21.8	0.25	
87	15.07	0.0225	0.25	< 0.567	2	1.19	0.25	0.0249	0.25	2.13	0.25	0.354	0.25	0.153	0.25	0.00050	0.25	0.00854	0.25	20	0.25	0.280	0.25	1.37	3	11.3	0.25	
88	15.5	< 0.0108	0.25	< 0.0731	1.8	0.397	0.25	0.0076	0.25	0.671	0.25	0.0788	0.25	0.00136	0.25	0.00056	0.25	0.00385	0.25			0.0161	0.25	0.056	0.25	8.28	0.25	
89	15.5	0.0429	3	0.764	2	8.48	0.25	0.272	1	12.7	0.25	2.72	0.25	0.0155	0.25	0.0040	0.25	0.0440	0.25			0.247	2	1.56	2</			

Table 3-6 Constituents Considered in Analysis of Extreme Values

Parameter	Number of Datapoints	Frequency of Detection
Metals		
Aluminum	108	100%
Antimony	108	99%
Arsenic	108	100%
Barium	108	100%
Beryllium	108	100%
Cadmium	108	100%
Chromium	108	100%
Cobalt	105	100%
Copper	191	100%
Cyanide	99	52%
Iron	108	100%
Lead	104	100%
Manganese	105	100%
Mercury	107	100%
Nickel	188	100%
Selenium	108	54%
Silver	108	100%
Thallium	108	96%
Titanium	108	100%
Vanadium	108	100%
Zinc	108	100%
Organic Tins		
Dibutyltin	108	83%
Monobutyltin	108	86%
Tributyltin	108	80%
Pesticides		
2,4'-DDD	107	100%
2,4'-DDE	107	97%
2,4'-DDT	107	77%
4,4'-DDx	107	100%
Aldrin	107	85%
Alpha-BHC	107	51%
Beta-BHC	107	66%
Dieldrin	107	97%
Cis-Nonachlor	107	99%
Endosulfan II	107	81%
Endosulfan Sulfate	107	69%
Heptachlor	107	69%
Heptachlor Epoxide	107	94%
trans-Nonachlor	107	99%
Sum of Chlordane	107	100%

Table 3-6 Constituents Considered in Analysis of Extreme Values (Continued)

Parameter	Number of Datapoints	Frequency of Detection
Dioxins and Furans		
TCDD TEQ	106	100%
2378 TCDD	106	83%
Volatile Organic Compounds		
1,4 Dichlorobenzene	83	60%
Carbon Disulfide	83	57%
Methyl tert-Butyl Ether	83	52%
Semi Volatile Organic Compounds		
Bis 2 (ethylhexyl)phthalate	108	97%
Butylbenzylphthalate	108	62%
Carbazole	108	76%
Di-n-octyl phthalate	108	62%
Hexachlorobenzene	107	96%
Polycyclic Aromatic Hydrocarbons		
Total HMW PAHs	108	100%
Total LMW PAHs	108	99%
Polychlorinated Biphenyls		
Total PCBs	108	100%
Total Petroleum Hydrocarbons		
TPH-Extractable	108	97%

Note: Copper and Nickel were analyzed in surficial sediment from cores and grabs.

Table 3-7 Evaluation Steps for Extreme Values

Parameter	Results of GOF ¹	Next Step	Number of Values Removed for Re-Analysis of Distribution	Results of GOF with Revised Dataset	Method for Extreme Value Identification	Mean Concentration ²	Median Concentration ²	Location of Extreme Value	Extreme Value ²	Notes
Metals										
Aluminum	Neither	Distribution not discernable.	--	--	75 th percentile + 3 x IQR	8815	8275	No extreme values	-	
Antimony	Neither	Distribution not discernable.	--	--	75th percentile + 3 x IQR	0.95	0.82	08A-CLRC-076-core	3.5	*
								08A-CLRC-048-core	5.14	
Arsenic	Neither	Distribution not discernable.	--	--	75th percentile + 3 x IQR	7.3	5.85	08A-CLRC-062-core	31.5	*
								08A-CLRC-045-core	31.7	*
								08A-CLRC-002-core	56	
Barium	Neither	Identify datapoints diverging from normal	2	Neither	75th percentile + 3 x IQR	143	117	08A-CLRC-045-core	373	*
								08A-CLRC-090-core	549	
								08A-CLRC-073-core	1040	
Beryllium	Neither	Identify datapoints diverging from normal	1	Neither	75 th percentile + 3 x IQR	0.45	0.44	No extreme values	-	
Cadmium	Neither	Identify datapoints diverging from normal	6	Neither	75th percentile + 3 x IQR	3.0	2.4	08A-CLRC-062-core	13.2	*
								08A-CLRC-040-core	15.7	*
								08A-CLRC-115-core	15.9	*
								08A-CLRC-045-core	29.9	
Chromium	Neither	Identify datapoints diverging from normal	1	Neither	75th percentile + 3 x IQR	93	71	08A-CLRC-115-core	419	
								08A-CLRC-045-core	1140	
Cobalt	Normal	Continue with Rosner's Test	--	--	Rosner's with untransformed data	7.4	7.4	No extreme values	-	
Copper	Neither	Identify datapoints diverging from normal	3	Neither	75th percentile + 3 x IQR	123	115	08A-CLRC-045-core	577	*
Cyanide	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	0.52	0.38	No extreme values	-	
Iron	Neither	Distribution not discernable.	--	--	75 th percentile + 3 x IQR	20551	21150	No extreme values	-	
Lead	Neither	Identify datapoints diverging from normal	6	Normal	Rosner's with untransformed data	217	209	08A-CLRC-073-core	641	*
								08A-CLRC-045-core	763	*
Manganese	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	416	286	08A-CLRC-073-core	7110	
Mercury	Neither	Distribution not discernable.	--	--	75th percentile + 3 x IQR	1.8	1.5	08A-CLRC-057-core	9.3	
								08A-CLRC-062-core	9.31	
								08A-CLRC-101-core	10.4	
								08A-CLRC-045-core	13.4	
Nickel	Neither	Distribution not discernable.	--	--	75th percentile + 3 x IQR	25.8	26.2	08A-CLRC-045-core	94	*
Selenium	Neither	Distribution not discernable.	--	--	75th percentile + 3 x IQR	1.2	1.1	08A-CLRC-009-core	2.6	*
								08A-CLRC-020-core	2.6	*
								08A-CLRC-025-core	2.6	*
								08A-CLRC-022-core	2.9	*
Silver	Neither	Identify datapoints diverging from normal	3	Neither	75th percentile + 3 x IQR	2.1	1.5	08A-CLRC-062-core	10.8	
								08A-CLRC-115-core	13.7	
								08A-CLRC-045-core	13.7	
Thallium	Neither	Distribution not discernable.	--	--	75th percentile + 3 x IQR	0.151	0.145	No extreme values	-	
Titanium	Normal	Continue with Rosner's Test	--	--	Rosner's with untransformed data	335	340	No extreme values	-	
Vanadium	Neither	Identify datapoints diverging from normal	3	Neither	75th percentile + 3 x IQR	24.5	22.9	08A-CLRC-045-core	109	*
Zinc	Neither	Distribution not discernable.	--	--	75th percentile + 3 x IQR	367	331	No extreme values	-	

Table 3-7 Evaluation Steps for Extreme Values (Continued)

Parameter	Results of GOF ¹	Next Step	Number of Values Removed for Re-Analysis of Distribution	Results of GOF with Revised Dataset	Method for Extreme Value Identification	Mean Concentration ²	Median Concentration ²	Location of Extreme Value	Extreme Value ²	Notes
Organic Tins										
Dibutyltin	Neither	Identify datapoints diverging from normal	5	Neither	75th percentile + 3 x IQR	0.03	0.02	08A-CLRC-115-core	0.19	*
								08A-CLRC-010-core	0.25	*
Monobutyltin	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	0.02	0.01	No extreme values	-	
Tributyltin	Neither	Identify datapoints diverging from normal	5	Neither	75th percentile + 3 x IQR	0.014	0.009	08A-CLRC-115-core	0.069	*
								08A-CLRC-055-core	0.099	
Pesticides										
2,4-DDD	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	0.02	0.01	No extreme values	-	
2,4-DDE	Neither	Distribution not discernable.	--	--	75th percentile + 3 x IQR	0.007	0.002	08A-CLRC-040-core	0.024	*
								08A-CLRC-087-core	0.031	*
								08A-CLRC-115-core	0.032	*
								08A-CLRC-069-core	0.042	*
								08A-CLRC-057-core	0.0635	
								08A-CLRC-045-core	0.093	
								08A-CLRC-062-core	0.13	
2,4-DDT	Neither	Identify datapoints diverging from normal	2	Lognormal	Rosner's with log-transformed data	0.003	0.001	No extreme values	-	
Total DDx	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	0.11	0.05	No extreme values	-	
Aldrin	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	0.0008	1	No extreme values	-	
Alpha-BHC	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	0.00008	0.00034	No extreme values	-	
Beta-BHC	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	0.0038	0.00012	No extreme values	-	
Dieldrin	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	0.00898	0.0036	No extreme values	-	
Cis-Nonachlor	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	0.00557	0.0034	No extreme values	-	
Endosulfan II	Neither	Identify datapoints diverging from normal	2	Neither	75th percentile + 3 x IQR	0.00102	0.00069	08A-CLRC-042-core	0.0051	*
								08A-CLRC-076-core	0.0052	*
Endosulfan Sulfate	Neither	Identify datapoints diverging from normal	2	Neither	75th percentile + 3 x IQR	0.00021	0.00011	08A-CLRC-047-core	0.000946	*
								08A-CLRC-019-core	0.0011	*
								08A-CLRC-041-core	0.0015	
								08A-CLRC-042-core	0.0015	
Heptachlor	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	0.00015	0.00009	No extreme values	-	
Heptachlor Epoxide	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	0.0011	0.0006	No extreme values	-	
trans-Nonachlor	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	0.014	0.009	No extreme values	-	
Sum of Chlordane	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	0.069	0.041	No extreme values	-	
Dioxins and Furans										
TCDD TEQ	Neither	Identify datapoints diverging from normal	2	Neither	75th percentile + 3 x IQR	511	197	2008 CLRC-069	1800	*
								2008 CLRC-029	2070	*
								2008 CLRC-115	2190	*
								2008 CLRC-043	2520	*
								2008 CLRC-067	6610	
								2008 CLRC-045	13600	

Table 3-7 Evaluation Steps for Extreme Values (Continued)

Parameter	Results of GOF ¹	Next Step	Number of Values Removed for Re-Analysis of Distribution	Results of GOF with Revised Dataset	Method for Extreme Value Identification	Mean Concentration ²	Median Concentration ²	Location of Extreme Value	Extreme Value ²	Notes
Dioxins and Furans										
2378 TCDD	Neither	Identify datapoints diverging from normal	2	Neither	75th percentile + 3 x IQR	479	166	2008 CLRC-069	1751.136	*
								2008 CLRC-029	2002.107	*
								2008 CLRC-115	2094.57	*
								2008 CLRC-043	2471.97	*
								2008 CLRC-067	6491.28	
								2008 CLRC-045	13454.31	
Volatile Organic Compounds										
1,4 Dichlorobenzene	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	0.003	0.002	08A-CLRC-033-grab	0.076	
Carbon Disulfide	Neither	Identify datapoints diverging from normal	2	Lognormal	Rosner's with log-transformed data	0.004	0.001	08A-CLRC-039-grab	0.084	ND
								08A-CLRC-036-grab	0.15	ND
Methyl tert-Butyl Ether	Neither	Identify datapoints diverging from normal	3	Lognormal	Rosner's with log-transformed data	0.005	0.001	08A-CLRC-059-grab	0.05	
								08A-CLRC-039-grab	0.084	ND
								08A-CLRC-036-grab	0.15	ND
Semi Volatile Organic Compounds										
Bis 2 (ethylhexyl)phthalat	Neither	Distribution not discernable.	--	--	75th percentile + 3 x IQR	6.2	5.2	08A-CLRC-019-core	28	*
								08A-CLRC-057-core	33.7	*
								08A-CLRC-045-core	37	*
								08A-CLRC-115-core	49	*
Butylbenzylphthalate	Neither	Identify datapoints diverging from normal	10	Neither	75th percentile + 3 x IQR	0.7	0.2	08A-CLRC-031-core	0.98	*
								08A-CLRC-037-core	1.1	*
								08A-CLRC-045-core	1.3	ND/*
								08A-CLRC-057-core	1.38	ND/*
								08A-CLRC-041-core	2	*
								08A-CLRC-066-core	2.4	ND/*
								08A-CLRC-115-core	2.5	ND/*
								08A-CLRC-098-core	3.4	ND/*
								08A-CLRC-103-core	8.5	ND
Carbazole	Neither	Identify datapoints diverging from normal	5	Neither	75th percentile + 3 x IQR	0.45	0.17	08A-CLRC-043-core	25	
								08A-CLRC-064-core	0.87	*
								08A-CLRC-015-core	0.88	ND/*
								08A-CLRC-045-core	1.3	ND/*
								08A-CLRC-057-core	1.38	ND/*
								08A-CLRC-098-core	3.4	ND
								08A-CLRC-103-core	8.5	ND
08A-CLRC-066-core	9.9									

Table 3-7 Evaluation Steps for Extreme Values (Continued)

Parameter	Results of GOF ¹	Next Step	Number of Values Removed for Re-Analysis of Distribution	Results of GOF with Revised Dataset	Method for Extreme Value Identification	Mean Concentration ²	Median Concentration ²	Location of Extreme Value	Extreme Value ²	Notes
Semi Volatile Organic Compounds										
Di-n-octyl phthalate	Neither	Identify datapoints diverging from normal	5	Neither	75th percentile + 3 x IQR	0.5	0.25	08A-CLRC-015-core	1	*
								08A-CLRC-040-core	1.2	*
								08A-CLRC-066-core	1.2	*
								08A-CLRC-115-core	1.3	*
								08A-CLRC-080-core	1.3	*
								08A-CLRC-067-core	2.38	
								08A-CLRC-098-core	3.4	ND
								08A-CLRC-057-core	3.5	
								08A-CLRC-045-core	3.8	
08A-CLRC-103-core	8.5	ND								
Hexachlorobenzene	Lognormal	Continue with Rosner's Test	--	--	Rosner's with log-transformed data	0.007	0.002	No extreme values	-	
Polycyclic Aromatic Hydrocarbons										
Total HMW PAHs	Neither	Identify datapoints diverging from normal	9	Neither	75th percentile + 3 x IQR	40	18	08A-CLRC-079-core	156	*
								08A-CLRC-076-core	209	*
								08A-CLRC-115-core	266	*
								08A-CLRC-098-core	315	*
								08A-CLRC-104-core	522	
								08A-CLRC-103-core	542	
Total LMW PAHs	Neither	Identify datapoints diverging from normal	8	Neither	75th percentile + 3 x IQR	18.3	3.3	08A-CLRC-076-core	31.9	*
								08A-CLRC-086-core	59.7	*
								08A-CLRC-079-core	63.1	*
								08A-CLRC-031-core	82.5	*
								08A-CLRC-098-core	86.6	*
								08A-CLRC-115-core	215	
								08A-CLRC-103-core	453	
								08A-CLRC-104-core	545	
Polychlorinated Biphenyls										
Total PCBs	Neither	Identify datapoints diverging from normal	6	Neither	75th percentile + 3 x IQR	1.2	0.73	08A-CLRC-115-core	4.89	
								08A-CLRC-101-core	5.11	
								08A-CLRC-029-core	7.01	
								08A-CLRC-057-core	8.33	
								08A-CLRC-076-core	8.86	
								08A-CLRC-045-core	18.9	
Total Petroleum Hydrocarbons										
TPH-Extractable	Neither	Distribution not discernable.	--	--	75th percentile + 3 x IQR	1180	958	No extreme values	-	

Table 3-7 Evaluation Steps for Extreme Values (Continued)

Notes

- 1) Goodness of Fit statistics interpreted by looking at Lilliefors (NDs=DL) test.
- 2) Concentrations are mg/kg with exception of PCDD/Fs which are in ng/kg
- ND = Nondetect
- * = Values that were identified as potential extreme values based on the evaluation of the IQR, yet do not appear to be extreme values based on visual inspection.

Table 3-8 Extreme Values by Location and Sample

Sampling Location ID	River Mile	Compounds with Extreme Values	Notes
08A-CLRC-002-core	0.00	Arsenic	
08A-CLRC-009-core	0.46	Selenium	
08A-CLRC-010-core	0.63	Dibutyltin	
08A-CLRC-015-core	1.11	Carbazole	
		Di-n-octyl phthalate	
08A-CLRC-019-core	1.47	Bis 2 (ethylhexyl)phthalate	One-tenth mile from bridge piling, relatively coarse sediments (37% fines) for lower river
		Endosulfan Sulfate	
08A-CLRC-020-core	1.47	Selenium	
08A-CLRC-022-core	2.64	Selenium	Elevated H ₂ S readings noted in top segment of core.
08A-CLRC-025-core	2.85	Selenium	
08A-CLRC-029-core	3.53	Total PCBs	
		TCDD TEQ	
		2378 TCDD	
08A-CLRC-031-core	4.25	Butylbenzylphthalate	Adjacent to CSO
		Total Low-molecular-weight PAHs	
08A-CLRC-033-grab	5.00	1,4 Dichlorobenzene	
08A-CLRC-036-grab	5.51	Carbon Disulfide	Both constituents are non-detects.
		MTBE	
08A-CLRC-037-core	5.51	Butylbenzylphthalate	
08A-CLRC-039-grab	6.27	Carbon Disulfide	Both constituents are non-detects.
		MTBE	
08A-CLRC-040-core	6.49	2,4-DDE	
		Cadmium	
		Di-n-octyl phthalate	
08A-CLRC-041-core	6.49	Butylbenzylphthalate	
		Endosulfan Sulfate	
08A-CLRC-042-core	6.50	Endosulfan II	
		Endosulfan Sulfate	
08A-CLRC-043-core	7.00	Butylbenzylphthalate	
		TCDD TEQ	
		2378 TCDD	
08A-CLRC-045-core	7.00	2,4-DDE	
		Arsenic	
		Barium	
		Bis 2 (ethylhexyl)phthalate	
		Butylbenzylphthalate	
		Cadmium	
		Carbazole	
		Chromium	
		Copper	
		Di-n-octyl phthalate	
		Lead	
		Mercury	
		Nickel	
		Silver	
		TCDD TEQ	
		2378 TCDD	
		Total PCBs	
		Vanadium	
08A-CLRC-047-core	7.45	Endosulfan Sulfate	
08A-CLRC-048-core	7.44	Antimony	
08A-CLRC-055-core	8.44	Tributyltin	

Table 3-8 Extreme Values by Location and Sample (Continued)

Sampling Location ID	River Mile	Compounds with Extreme Values	Notes
08A-CLRC-057-core	8.99	2,4-DDE	In silt pocket along shoreline
		Bis 2 (ethylhexyl)phthalate	
		Butylbenzylphthalate	
		Carbazole	
		Di-n-octyl phthalate	
		Mercury	
		Total PCBs	
08A-CLRC-059-grab	9.50	MTBE	
08A-CLRC-062-core	10.02	2,4-DDE	In silt pocket
		Arsenic	
		Cadmium	
		Mercury	
		Silver	
08A-CLRC-064-core	10.55	Carbazole	
08A-CLRC-066-core	10.93	Butylbenzylphthalate	
		Carbazole	
		Di-n-octyl phthalate	
08A-CLRC-067-core	10.93	Di-n-octyl phthalate	In silt pocket
		TCDD TEQ	
		2378 TCDD	
08A-CLRC-069-core	11.51	2,4-DDE	In silt pocket
		TCDD TEQ	
		2378 TCDD	
08A-CLRC-073-core	12.30	Barium	In silt pocket
		Lead	
		Manganese	
08A-CLRC-076-core	12.79	Antimony	
		Endosulfan II	
		Total High-molecular-weight PAHs	
		Total Low-molecular-weight PAHs	
		Total PCBs	
08A-CLRC-079-core	13.58	Total High-molecular-weight PAHs	
		Total Low-molecular-weight PAHs	
08A-CLRC-080-core	13.58	Di-n-octyl phthalate	
08A-CLRC-086-core	15.07	Total Low-molecular-weight PAHs	
08A-CLRC-087-core	15.07	2,4-DDE	
08A-CLRC-090-core	15.63	Barium	
08A-CLRC-098-core	17.45	Butylbenzylphthalate	Dundee Lake. Phthalates and carbazole extreme values are non-detects.
		Carbazole	
		Di-n-octyl phthalate	
		Total High-molecular-weight PAHs	
		Total Low-molecular-weight PAHs	
08A-CLRC-101-core	17.45	Mercury	
		Total PCBs	
08A-CLRC-103-core	17.80	Butylbenzylphthalate	Dundee Lake. Phthalates and carbazole extreme values are non-detects.
		Carbazole	
		Di-n-octyl phthalate	
		Total High-molecular-weight PAHs	
		Total Low-molecular-weight PAHs	
08A-CLRC-104-core	18.30	Total High-molecular-weight PAHs	Dundee Lake
		Total Low-molecular-weight PAHs	
08A-CLRC-115-core	4.21	2,4-DDE	Adjacent to CSO
		Bis 2 (ethylhexyl)phthalate	
		Butylbenzylphthalate	
		Cadmium	
		Chromium	
		Dibutyltin	
		Di-n-octyl phthalate	
		Silver	
		Total High-molecular-weight PAHs	
		Total Low-molecular-weight PAHs	
		Total PCBs	
		TCDD TEQ	
		2378 TCDD	
		Tributyltin	

Table 3-9 Mercury and Methyl Mercury Data in Surficial Segments¹

Location 2008-CLRC-	River Mile	Mercury (mg/kg)²	Methyl Mercury (mg/kg)²	% Methyl Mercury (of total Mercury)
001	-0.15	2.11	0.00256	0.12
007	0.41	1.65	0.00186	0.11
021	1.94	1.76	0.00856	0.49
026	3.17	2.48	0.00433	0.17
034	5.3	0.624	0.00243	0.39
045	7	13.4	0.0115	0.09
067	10.93	2.55	0.00614	0.24
073	12.3	3.18	0.00438	0.14
082	14.09	0.34	0.00173	0.51
100	17.59	0.398	0.000691	0.17

Note: Field duplicates are not included in the above summary of data.

¹ All data presented have been validated. Data qualifiers are presented in **Appendix O** for all samples and analytes.

² If ND, the numerical value associated with the DL was reported.

Table 3-10 Sediment Grab Sample SEM and AVS Analytical Results

Analyte	Sample ID	08A-0001-G2AS	08A-0007-G2AS	08A-0021-G4AS	08A-0026-G2AS	08A-0034-G2AS	08A-0045-G2AS	08A-0067-G2AS	08A-0073-G5AS	08A-0082-G2AS	08A-0100-G2AS
SEM	UNIT										
Cadmium	umol/g	0.0098	0.014	0.022	0.026	0.019	0.055	0.04	0.036	0.0086	0.0052
Copper	umol/g	1.5	1.78	2.22	2.408	0.467	3.62	3.18	2.75	0.732	0.456
Lead	umol/g	0.565	0.642	1.19	0.96	2.17	1.49	1.28	1.19	0.656	0.333
Nickel	umol/g	0.291	0.305	0.37	0.416	0.184	0.552	0.41	0.361	0.14	0.095
Zinc	umol/g	3.2	4.08	6.61	6.59	5.19	10.5	9.94	9.18	4.36	1.9
AVS	umol/g	0.26	0.608	16	1.95	7.05	9.98	1.33	3.03	3.21	<0.02
Analyte	Sample ID	08A-0001-C2AS	08A-0007-C1AS	08A-0021-C2AS	08A-0026-C2AS	08A-0034-C3AS	08A-0045-C1AS	08A-0067-C3AS	08A-0073-C2AS	08A-0082-G2AS	08A-0100-C2AS
Total Organic Carbon	mg/kg	33900	36100	119000	45900	149000	76300	62600	61400	41000	43300

Sum SEM	umol/g	5.6	6.8	10.4	10.4	8	16.2	14.9	13.5	5.9	2.8
SEM - AVS	umol/g	5.3	6.2	-5.6	8.5	1	6.2	13.5	10.5	2.7	2.8
Fraction oc	oc/sediment	0.0339	0.0361	0.119	0.0459	0.149	0.0763	0.0626	0.0614	0.041	0.0433
(SEM - AVS)/foc	umol/g-oc	156	172	-47	185	7	81	216	171	66	65

Notes:

All data presented have been validated.

Only detected concentrations used in calculation for AVS and SEM analytes.

NC – not calculated due to presence of non-detects.

Bold text indicates Sum SEM - AVS > 0.

Shaded text indicates (SEM-AVS)/foc > 130 umol/g-oc.

AVS = Acid Volatile Sulfides.

SEM = Simultaneously Extracted Metals.

Table 3-11 Comparison of Group A and Group D Concentrations¹

Location 2008-CLRC-	Group	Depth Interval	2,3,7,8- TCDD (ng/kg)	Total TEQ HH (ng/kg)	Total PCB (mg/kg)	Total HMW PAHs (mg/kg)	Total LMW PAHs (mg/kg)	Total DDx (mg/kg)	Dieldrin (mg/kg)	Total Chlordane (mg/kg)	Lead (mg/kg)	Mercury (mg/kg)	Cadmium (mg/kg)	Copper (mg/kg)	TOC (%)
019	A	0 - 0.5 ft	426	494	2.11	122	20.6	0.41	0.025	0.322	292	1.11	5.01	133	18.9
		0.5 - 1.5 ft	335	421	1.79	27.9	4.78	0.141	0.0037	0.105	300	2.71	4.92	185	7.75
		1.5 - 2.5 ft	816	1010	3.94	27.3	5.73	0.209	0.0055	0.119	339	3.98	6.29	224	4.67
	D	0 - 0.07 ft	451	594	1.95	27.3	4.9	0.139	0.0077	0.0792	264	1.71	3.95	191	7.57
		0.07 - 0.16 ft	300	356	1.13	45.4	10.1	0.132	0.0062	0.0682	202	1.23	3.03	140	6.66
		0.16 - 0.33 ft	262	346	2.92	81.1	11.3	0.222	0.023	0.327	251	1.12	3.08	134	16.8
		0.33 - 0.98 ft	323	400	1.17	17.8	3.21	0.143	0.0035	0.0644	277	1.83	4.08	190	6.54
		0.98 - 1.97 ft	955	1170	3.48	25.6	5.44	0.33	0.0022	0.0475	461	5.63	9.52	311	4.9
022	A	0 - 0.5 ft	1340	1430	1.23	5.22	0.78	0.156	0.0029	0.0434	260	2.7	4.48	204	5.03
		0.5 - 1.5 ft	623	858	2.5	6.72	1.21	0.216	0.0058	0.097	419	4.44	8.2	301	5.4
		1.5 - 2.5 ft	2810	3280	6.55	30.2	5.34	0.62	0.025	0.216	936	10	8.26	316	4.18
	D	0 - 0.07 ft	415	518	1.12	10.7	1.92	0.017	0.0011	0.0127	215	1.83	3.36	219	5.56
		0.07 - 0.16 ft	164	233	1.02	10	1.68	0.067	0.0028	0.037	223	2.13	3.84	218	4.74
		0.16 - 0.33 ft	287	383	1.21	10.5	1.51	0.0607	0.0018	0.0362	224	2.75	4.34	211	5.86
		0.33 - 0.98 ft	732	1020	2.14	12.8	2.32	0.119	0.0023	0.0507	319	3.32	5.98	290	5.85
		0.98 - 2 ft	764	1450	6.23	34.2	6.86	0.241	0.0087	0.101	541	10.8	11.4	493	5.43
028	A	0 - 0.5 ft	311	393	1.18	19.7	3.98	0.12	0.011	0.124	216	1.82	3.38	168	6.44
		0.5 - 1.5 ft	355	422	1.39	18.8	3.75	0.151	0.0052	0.135	272	2.35	4.5	215	6.08
		1.5 - 2.5 ft	538	632	1.62	24.1	4.12	0.145	0.0015	0.104	288	2.52	5.16	219	5.41
	D	0 - 0.07 ft	245	292	1.06	37.6	6.28	0.0913	0.0052	0.0566	208	0.876	2.02	107	6.22
		0.07 - 0.16 ft	409	520	1.14	14.1	1.85	0.277	0.0099	0.132	207	2.43	3.56	175	6.24
		0.16 - 0.33 ft	587	720	1.54	20.8	3.3	0.131	0.0083	0.129	284	2.06	3.71	184	6.46
		0.33 - 0.98 ft	427	512	1.28	27.5	4.4	0.118	0.0042	0.0999	248	2.31	3.93	185	5.96
		0.98 - 1.97 ft	202	264	1.13	21.8	3.73	0.111	0.0014	0.087	272	2.57	4.57	238	5.88
034	A	0 - 0.5 ft	181	207	0.854	55.9	8.83	0.051	0.0025	0.0503	338	0.624	3.61	173	14.9
		0.5 - 1.5 ft	719	768	2.11	51.2	7.3	0.0947	0.0011	0.0991	319	1.79	3.46	165	6.5
		1.5 - 2.5 ft	1730	1830	4.29	46.2	9.81	0.158	0.0088	0.0841	581	3.31	5.03	214	4.54
	D	0 - 0.07 ft	226	268	0.545	44.4	9.23	0.098	0.006	0.0576	239	0.714	1.63	193	4.85
		0.07 - 0.16 ft	129	144	0.705	21.7	3.21	0.0454	0.0039	0.0442	307	0.444	1.02	400	2.84
		0.16 - 0.33 ft	279	325	0.949	21.9	2.65	0.0352	0.00076	0.0308	259	1.23	2.39	125	3.69
		0.33 - 0.98 ft	259	316	1.15	22.5	2.94	0.07	0.0011	0.0564	378	1.12	2.48	159	3.78
		0.98 - 1.97 ft	338	402	2.33	64.8	7.46	0.0988	0.0042	0.0691	346	1.31	2.41	82.5	3.65
047	A	0 - 0.5 ft	359	427	2.19	46.2	10.9	0.413	0.152	0.354	247	1.7	1.79	121	5.39
		0.5 - 1.5 ft	85.7	106	0.891	18.2	5.42	0.0339	0.000762	0.0206	133	0.62	3.47	77.4	4.54
		1.5 - 2.5 ft	142	147	0.294	27.4	2.46	0.188	0.000958	0.0138	111	0.556	1.24	61.4	4.39
	D	0 - 0.07 ft	161	210	0.929	19.6	2.49	0.099	0.0064	0.102	163	0.874	1	71	4.13
		0.07 - 0.16 ft	134	164	0.425	19.4	4.43	0.108	0.0068	0.0812	198	0.804	1.59	96.1	9.99
		0.16 - 0.33 ft	86	110	0.329	210	56.7	0.123	0.0036	0.0378	141	0.386	0.718	58.6	4.25
		0.33 - 0.98 ft	64	75.7	0.257	27.4	7.23	0.00466	0.00031	0.00247	127	0.334	0.73	63.2	4.03
		0.98 - 1.97 ft	191	215	0.682	8.05	1.56	0.105	0.014	0.123	196	1.4	2.49	124	4.62

Table 3-11 Comparison of Group A and Group D Concentrations¹ (Continued)

Location 2008-CLRC-	Group	Depth Interval	2,3,7,8- TCDD (ng/kg)	Total TEQ HH (ng/kg)	Total PCB (mg/kg)	Total HMW PAHs (mg/kg)	Total LMW PAHs (mg/kg)	Total DDx (mg/kg)	Dieldrin (mg/kg)	Total Chlordane (mg/kg)	Lead (mg/kg)	Mercury (mg/kg)	Cadmium (mg/kg)	Copper (mg/kg)	TOC (%)
062	A	0 - 0.5 ft	29.2	87.2	1.32	53	11.5	0.93	0.0024	0.0282	446	9.31	13.2	460	7.54
		0.5 - 1.5 ft	9.64	194	1.04	49.2	12	0.247	0.00013	0.00103	630	12.2	14.4	661	7.93
		1.5 - 2.5 ft	10.3	321	1.8	47.1	13.4	0.00556	0.00022	0.00024	680	14.5	56.8	757	9.87
	D	0 - 0.07 ft	124	180	1.29	18.7	2.55	0.74	0.05	0.429	237	1.91	3.8	209	7
		0.07 - 0.16 ft	175	235	1.1	8.92	1.24	0.0749	0.0013	0.0479	233	2.01	3.77	205	6.36
		0.16 - 0.33 ft	585	691	1.07	11.9	1.62	0.0415	0.0045	0.0401	248	2.12	4.05	219	6.6
		0.33 - 0.98 ft	19.6	130	1.1	53.7	12.5	0.483	0.0016	0.0169	651	9.47	14.6	798	7.79
		0.98 - 1.97 ft	7.69	316	1.18	54.4	13.3	0.0639	0.00043	0.000185	800	11.9	40.5	841	9.03
078	A	0 - 0.5 ft	14.6	31.2	0.184	18.1	4.16	0.0156	0.002	0.0334	108	0.461	0.606	34.8	2.54
		0.5 - 1.5 ft	54.3	98.9	1.82	16.8	3.68	0.0251	0.0012	0.0506	166	0.623	1.85	80.7	4.44
		1.5 - 2.5 ft	44.7	62	0.386	41	10.6	0.0278	0.001	0.0501	221	0.651	2.43	92.7	4.05
	D	0 - 0.07 ft	36.6	63.9	0.854	34.2	3.7	0.0363	0.0081	0.078	233	0.456	1.54	92.6	11.1
		0.07 - 0.16 ft	14	25.1	0.162	29.7	4.6	0.0308	0.0049	0.0734	108	0.317	0.712	47.8	2.36
		0.16 - 0.33 ft	1.55	9.28	0.162	16.7	3.18	0.013	0.0028	0.0202	159	0.331	0.541	41.5	2.28
		0.33 - 0.98 ft	4.47	13.8	0.166	30.8	6.12	0.017	0.0018	0.0391	136	0.291	0.679	40	3.06
		0.98 - 1.97 ft	102	142	0.54	36.1	7.89	0.0358	0.00095	0.0554	211	0.943	1.54	104	6.78
115	A	0 - 0.5 ft	2090	2250	4.89	266	215	0.334	0.013	0.116	599	6.03	15.9	361	5.98
		0.5 - 1.5 ft	10900	11300	21.9	42	24.2	0.659	0.11	0.0714	804	13.7	32.7	702	7.71
		1.5 - 2.5 ft	23100	21000	18.2	49.3	26.4	1.71	0.12	0.0744	770	13.8	29.6	650	7.7
	D	0 - 0.07 ft	745	776	0.403	71.5	15.4	0.0414	0.0029	0.0179	1230	0.44	1.7	116	2.42
		0.07 - 0.16 ft	174	191	0.332	94.6	35.7	0.0296	0.00088	0.0125	827	0.318	0.702	253	3.32
		0.16 - 0.33 ft	721	791	1.32	53.3	7.83	0.283	0.067	0.0694	477	2.15	4.91	407	6.97
		0.33 - 0.98 ft	11000	11500	7.18	41	13.3	0.371	0.034	0.102	914	5.64	15.3	416	5.89
		0.98 - 1.97 ft	43600	44500	24.1	58.7	17.6	0.689	0.093	0.0645	877	12.2	30.9	689	8.31

Notes:

- ¹ All data presented has been validated. Data qualifiers are presented in **Appendix O** for all samples and analytes.
- ² The sum of the 4,4'-DDD, 4,4'-DDE, and 4,4'-DDT (by HRGC/HRMS method) detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.
- ³ The sum of 10 PAH compounds (by HRGC/LRMS-SIM method) with molecular weights greater than 200 gram/mole: Benzo[a]anthracene, Benzo[a]pyrene, Benzo[b]fluoranthene, Benzo[g,h,i]perylene, Benzo[k]fluoranthene, Chrysene, Dibenzo[a,h]anthracene, Fluoranthene, Indeno[1,2,3-cd]pyrene, and Pyrene detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.
- ⁴ The sum of six PAH compounds (by HRGC/LRMS-SIM method): Acenaphthene, Acenaphthylene, Anthracene, Fluorene, Naphthalene, and Phenanthrene detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.
- ⁵ The sum of all PCB congener (Method 1668A) detects; if all ND, reported as the numerical value associated with the highest individual congener DL.
- ⁶ The sum of the TEFs from the latest EPA report (USEPA 2010a) multiplied by detects for the individual group analytes for which TEFs are reported; if all ND, reported as the numerical value associated with the highest individual analyte.

Table 3-12 Comparison of Group A and Group D Concentrations, Normalized to TOC¹

Location 2008-CLRC-	Group	Depth Interval	2,3,7,8- TCDD (ng/kg)	Total TEQ (ng/kg) ⁷	Total PCBs (mg/kg) ⁵	Total HMW PAHs (mg/kg) ³	Total LMW PAHs (mg/kg) ⁴	Total DDx (mg/kg) ²	Dieldrin (mg/kg)	Total Chlordane (mg/kg)	Lead (mg/kg)	Mercury (mg/kg)	Cadmium (mg/kg)	Copper (mg/kg)	TOC (%) ⁶
019	A	0 - 0.5 ft	22.56	26.14	0.11	6.46	1.09	0.022	0.00132	0.01704	15.45	0.06	0.27	7.04	18.9
		0.5 - 1.5 ft	43.23	54.32	0.23	3.60	0.62	0.018	0.00048	0.01355	38.71	0.35	0.63	23.87	7.75
		1.5 - 2.5 ft	174.73	216.27	0.84	5.85	1.23	0.045	0.00118	0.02548	72.59	0.85	1.35	47.97	4.67
	D	0 - 0.07 ft	59.58	78.47	0.26	3.61	0.65	0.018	0.00102	0.01046	34.87	0.23	0.52	25.23	7.57
		0.07 - 0.16 ft	45.05	53.45	0.17	6.82	1.52	0.020	0.00093	0.01024	30.33	0.18	0.45	21.02	6.66
		0.16 - 0.33 ft	15.61	20.60	0.17	4.83	0.67	0.013	0.00137	0.01946	14.94	0.07	0.18	7.98	16.8
		0.33 - 0.98 ft	49.34	61.16	0.18	2.72	0.49	0.022	0.00054	0.00985	42.35	0.28	0.62	29.05	6.54
		0.98 - 1.97 ft	194.86	238.78	0.71	5.22	1.11	0.067	0.00045	0.00969	94.08	1.15	1.94	63.47	4.90
022	A	0 - 0.5 ft	266.36	284.29	0.24	1.04	0.16	0.031	0.00058	0.00863	51.69	0.54	0.89	40.56	5.03
		0.5 - 1.5 ft	115.32	158.89	0.46	1.24	0.22	0.040	0.00107	0.01796	77.59	0.82	1.52	55.74	5.40
		1.5 - 2.5 ft	672.64	784.69	1.57	7.22	1.28	0.148	0.00598	0.05167	223.92	2.39	1.98	75.60	4.18
	D	0 - 0.07 ft	74.67	93.17	0.20	1.92	0.35	0.003	0.00020	0.00228	38.67	0.33	0.60	39.39	5.56
		0.07 - 0.16 ft	34.67	49.16	0.22	2.11	0.35	0.014	0.00059	0.00781	47.05	0.45	0.81	45.99	4.74
		0.16 - 0.33 ft	48.95	65.36	0.21	1.79	0.26	0.010	0.00031	0.00618	38.23	0.47	0.74	36.01	5.86
		0.33 - 0.98 ft	125.15	174.36	0.37	2.19	0.40	0.020	0.00039	0.00867	54.53	0.57	1.02	49.57	5.85
		0.98 - 2 ft	140.74	267.03	1.15	6.30	1.26	0.044	0.00160	0.01860	99.63	1.99	2.10	90.79	5.43
028	A	0 - 0.5 ft	48.35	61.02	0.18	3.06	0.62	0.019	0.00171	0.01925	33.54	0.28	0.52	26.09	6.44
		0.5 - 1.5 ft	58.35	69.41	0.23	3.09	0.62	0.025	0.00086	0.02220	44.74	0.39	0.74	35.36	6.08
		1.5 - 2.5 ft	99.41	116.82	0.30	4.45	0.76	0.027	0.00028	0.01922	53.23	0.47	0.95	40.48	5.41
	D	0 - 0.07 ft	39.44	46.95	0.17	6.05	1.01	0.015	0.00084	0.00910	33.44	0.14	0.32	17.20	6.22
		0.07 - 0.16 ft	65.62	83.33	0.18	2.26	0.30	0.044	0.00159	0.02115	33.17	0.39	0.57	28.04	6.24
		0.16 - 0.33 ft	90.84	111.46	0.24	3.22	0.51	0.020	0.00128	0.01997	43.96	0.32	0.57	28.48	6.46
		0.33 - 0.98 ft	71.71	85.91	0.21	4.61	0.74	0.020	0.00070	0.01676	41.61	0.39	0.66	31.04	5.96
		0.98 - 1.97 ft	34.34	44.90	0.19	3.71	0.63	0.019	0.00024	0.01480	46.26	0.44	0.78	40.48	5.88
034	A	0 - 0.5 ft	12.13	13.89	0.06	3.75	0.59	0.003	0.00017	0.00338	22.68	0.04	0.24	11.61	14.9
		0.5 - 1.5 ft	110.61	118.15	0.32	7.88	1.12	0.015	0.00017	0.01525	49.08	0.28	0.53	25.38	6.50
		1.5 - 2.5 ft	380.73	403.08	0.94	10.18	2.16	0.035	0.00194	0.01852	127.97	0.73	1.11	47.14	4.54
	D	0 - 0.07 ft	46.69	55.26	0.11	9.15	1.90	0.020	0.00124	0.01188	49.28	0.15	0.34	39.79	4.85
		0.07 - 0.16 ft	45.25	50.70	0.25	7.64	1.13	0.016	0.00137	0.01556	108.10	0.16	0.36	140.85	2.84
		0.16 - 0.33 ft	75.68	88.08	0.26	5.93	0.72	0.010	0.00021	0.00835	70.19	0.33	0.65	33.88	3.69
		0.33 - 0.98 ft	68.39	83.60	0.30	5.95	0.78	0.019	0.00029	0.01492	100.00	0.30	0.66	42.06	3.78
		0.98 - 1.97 ft	92.54	110.14	0.64	17.75	2.04	0.027	0.00115	0.01893	94.79	0.36	0.66	22.60	3.65
047	A	0 - 0.5 ft	66.52	79.22	0.41	8.57	2.02	0.077	0.02820	0.06568	45.83	0.32	0.33	22.45	5.39
		0.5 - 1.5 ft	18.87	23.35	0.20	4.01	1.19	0.007	0.00017	0.00454	29.30	0.14	0.76	17.05	4.54
		1.5 - 2.5 ft	32.45	33.49	0.07	6.24	0.56	0.043	0.00022	0.00314	25.28	0.13	0.28	13.99	4.39
	D	0 - 0.07 ft	38.97	50.85	0.22	4.75	0.60	0.024	0.00155	0.02470	39.47	0.21	0.24	17.19	4.13
		0.07 - 0.16 ft	13.37	16.42	0.04	1.94	0.44	0.011	0.00068	0.00813	19.82	0.08	0.16	9.62	9.99
		0.16 - 0.33 ft	20.25	25.88	0.08	49.41	13.34	0.029	0.00085	0.00889	33.18	0.09	0.17	13.79	4.25
		0.33 - 0.98 ft	15.87	18.78	0.06	6.80	1.79	0.001	0.00008	0.00061	31.51	0.08	0.18	15.68	4.03
		0.98 - 1.97 ft	41.25	46.54	0.15	1.74	0.34	0.023	0.00303	0.02662	42.42	0.30	0.54	26.84	4.62

Table 3-12 Comparison of Group A and Group D Concentrations, Normalized to TOC¹ (Continued)

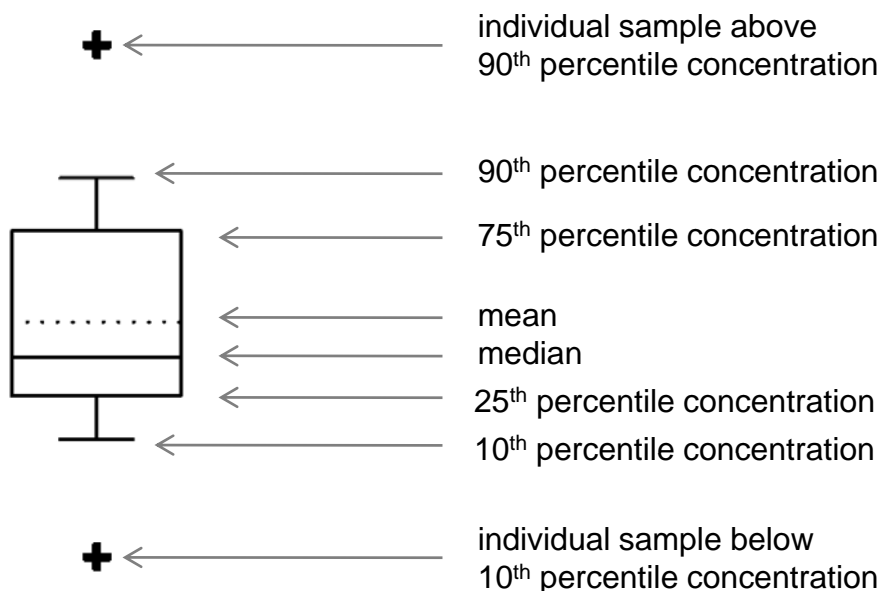
Location 2008-CLRC-	Group	Depth Interval	2,3,7,8- TCDD (ng/kg)	Total TEQ (ng/kg) ⁷	Total PCBs (mg/kg) ⁵	Total HMW PAHs (mg/kg) ³	Total LMW PAHs (mg/kg) ⁴	Total DDx (mg/kg) ²	Dieldrin (mg/kg)	Total Chlordane (mg/kg)	Lead (mg/kg)	Mercury (mg/kg)	Cadmium (mg/kg)	Copper (mg/kg)	TOC (%) ⁶
062	A	0 - 0.5 ft	3.88	11.56	0.18	7.03	1.53	0.123	0.00032	0.00374	59.15	1.23	1.75	61.01	7.54
		0.5 - 1.5 ft	1.22	24.46	0.13	6.20	1.51	0.031	0.00002	0.00013	79.45	1.54	1.82	83.35	7.93
		1.5 - 2.5 ft	1.04	32.52	0.18	4.77	1.36	0.001	0.00002	0.00002	68.90	1.47	5.75	76.70	9.87
	D	0 - 0.07 ft	17.71	25.71	0.18	2.67	0.36	0.106	0.00714	0.06129	33.86	0.27	0.54	29.86	7.00
		0.07 - 0.16 ft	27.56	36.95	0.17	1.40	0.19	0.012	0.00020	0.00753	36.64	0.32	0.59	32.23	6.36
		0.16 - 0.33 ft	88.63	104.70	0.16	1.80	0.25	0.006	0.00068	0.00608	37.58	0.32	0.61	33.18	6.60
		0.33 - 0.98 ft	2.52	16.69	0.14	6.89	1.60	0.062	0.00021	0.00217	83.57	1.22	1.87	102.44	7.79
		0.98 - 1.97 ft	0.85	34.99	0.13	6.02	1.47	0.007	0.00005	0.00002	88.59	1.32	4.49	93.13	9.03
078	A	0 - 0.5 ft	5.77	12.28	0.07	7.13	1.64	0.006	0.00079	0.01315	42.52	0.18	0.24	13.70	2.54
		0.5 - 1.5 ft	12.24	22.27	0.41	3.78	0.83	0.006	0.00027	0.01140	37.39	0.14	0.42	18.18	4.44
		1.5 - 2.5 ft	11.04	15.31	0.10	10.12	2.62	0.007	0.00025	0.01237	54.57	0.16	0.60	22.89	4.05
	D	0 - 0.07 ft	3.30	5.76	0.08	3.08	0.33	0.003	0.00073	0.00703	20.99	0.04	0.14	8.34	11.1
		0.07 - 0.16 ft	5.92	10.64	0.07	12.58	1.95	0.013	0.00208	0.03110	45.76	0.13	0.30	20.25	2.36
		0.16 - 0.33 ft	0.68	4.07	0.07	7.32	1.39	0.006	0.00123	0.00886	69.74	0.15	0.24	18.20	2.28
		0.33 - 0.98 ft	1.46	4.51	0.05	10.07	2.00	0.006	0.00059	0.01278	44.44	0.10	0.22	13.07	3.06
		0.98 - 1.97 ft	15.11	20.94	0.08	5.32	1.16	0.005	0.00014	0.00817	31.12	0.14	0.23	15.34	6.78
115	A	0 - 0.5 ft	350.26	376.25	0.82	44.48	35.95	0.056	0.00217	0.01940	100.17	1.01	2.66	60.37	5.98
		0.5 - 1.5 ft	1419.53	1465.63	2.84	5.45	3.14	0.085	0.01427	0.00926	104.28	1.78	4.24	91.05	7.71
		1.5 - 2.5 ft	3002.05	2727.27	2.36	6.40	3.43	0.222	0.01558	0.00966	100.00	1.79	3.84	84.42	7.70
	D	0 - 0.07 ft	308.00	320.66	0.17	29.55	6.36	0.017	0.00120	0.00740	508.26	0.18	0.70	47.93	2.42
		0.07 - 0.16 ft	52.52	57.53	0.10	28.49	10.75	0.009	0.00027	0.00377	249.10	0.10	0.21	76.20	3.32
		0.16 - 0.33 ft	103.42	113.49	0.19	7.65	1.12	0.041	0.00961	0.00996	68.44	0.31	0.70	58.39	6.97
		0.33 - 0.98 ft	1874.19	1952.46	1.22	6.96	2.26	0.063	0.00577	0.01732	155.18	0.96	2.60	70.63	5.89
		0.98 - 1.97 ft	5245.45	5354.99	2.90	7.06	2.12	0.083	0.01119	0.00776	105.54	1.47	3.72	82.91	8.31

Notes:

- ¹ All data presented has been validated. Data qualifiers are presented in **Appendix O** for all samples and analytes.
- ² The sum of the 4,4'-DDD, 4,4'-DDE, and 4,4'-DDT (by HRGC/HRMS method) detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.
- ³ The sum of 10 PAH compounds (by HRGC/LRMS-SIM method) with molecular weights greater than 200 gram/mole: Benzo[a]anthracene, Benzo[a]pyrene, Benzo[b]fluoranthene, Benzo[g,h,i]perylene, Benzo[k]fluoranthene, Chrysene, Dibenzo[a,h]anthracene, Fluoranthene, Indeno[1,2,3-cd]pyrene, and Pyrene detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.
- ⁴ The sum of six PAH compounds (by HRGC/LRMS-SIM method): Acenaphthene, Acenaphthylene, Anthracene, Fluorene, Naphthalene, and Phenanthrene detects; if all ND, reported as the numerical value associated with the highest individual analyte DL.
- ⁵ The sum of PCB congener (Method 1668A) detects; if all ND, reported as the numerical value associated with the highest individual congener DL.
- ⁶ TOC concentrations not normalized.
- ⁷ The sum of the TEFs from the latest EPA report (USEPA 2010a) multiplied by detects for the individual group analytes for which TEFs are reported; if all ND, reported as the numerical value associated with the highest individual analyte.

Figure 3.1 2008 LRC Box and Whisker Plots

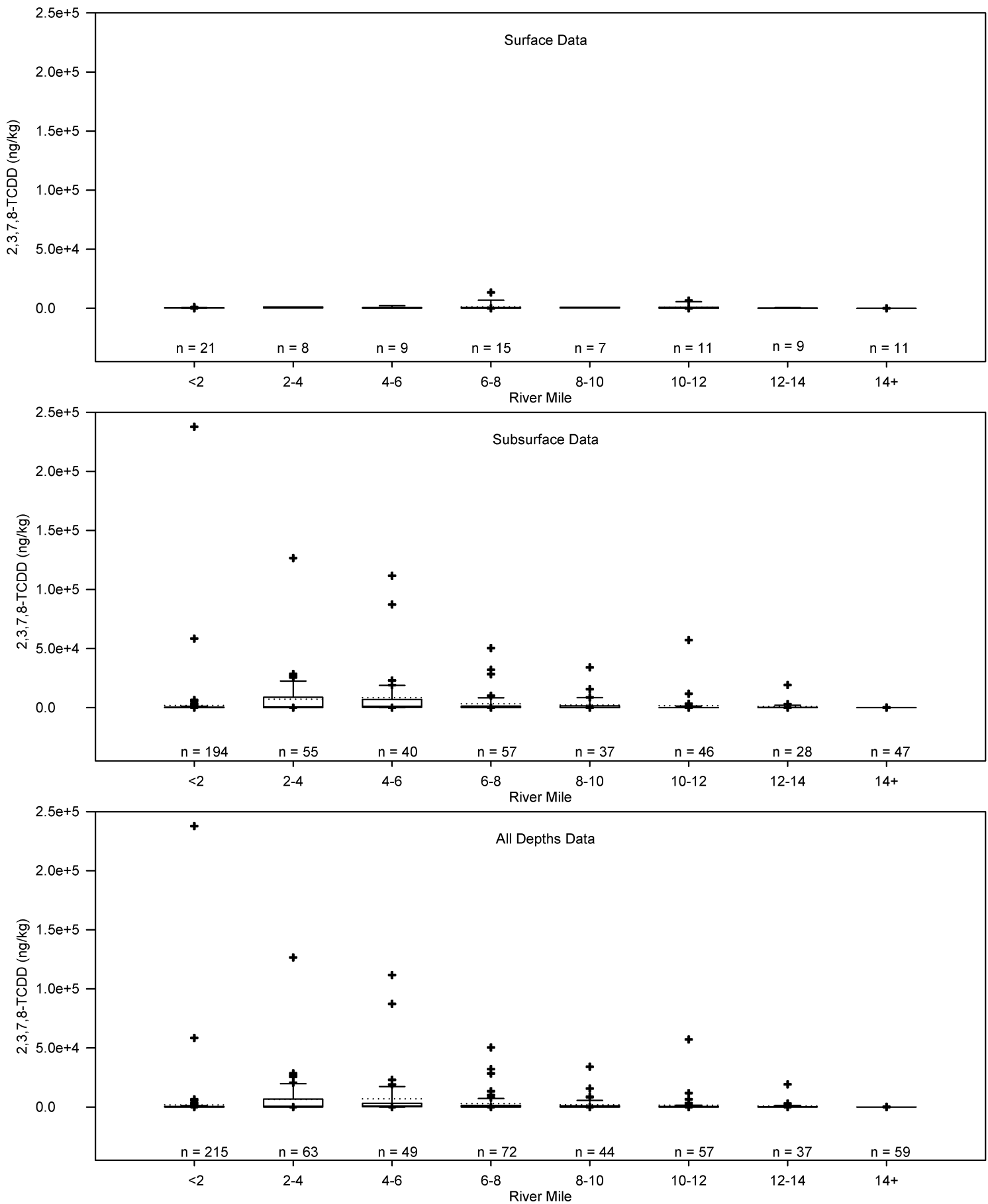
Box and Whisker Diagram Key



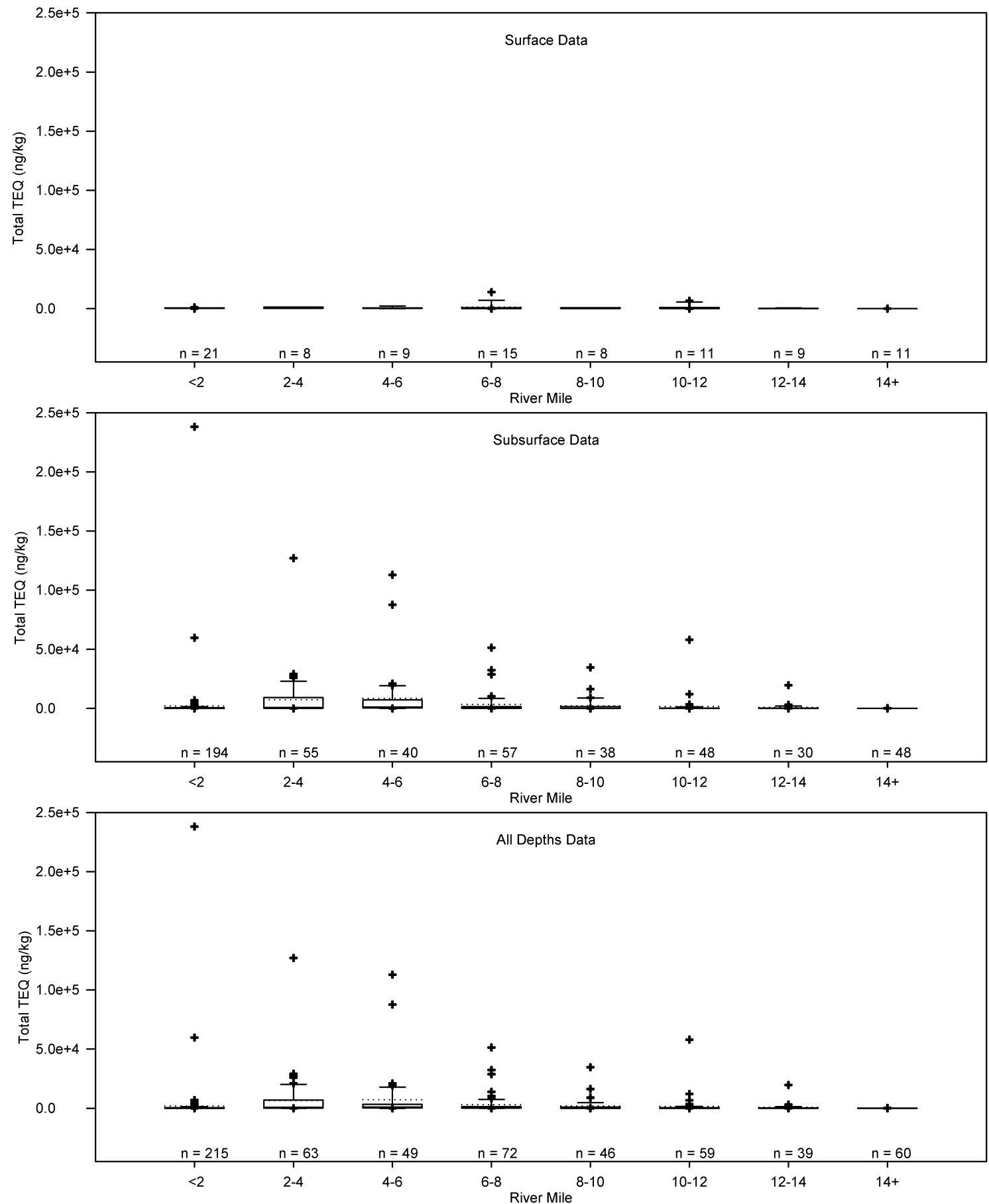
NOTES:

1. Non-detect samples for select chemicals were included and shown on the box and whisker plot at the full detection limit.
2. Box and whisker plots that show sums of multiple chemicals do not include non-detect results, unless all members of the group were not detected, then the sample was shown at the highest individual detection limit.
3. Surface sediment data consists of samples that have a depth interval of 0.0 ft to 0.5 ft.
4. Subsurface sediment data consists of samples that have a depth interval below than 0.5 ft.
5. All depths sediment data consists of both surface and subsurface samples.
6. CLRC-092 (RM 16) was not included in either the surface or subsurface plots as its interval do not match those defined above, however it was included in the all depths plot.
7. Notes for each chemical are included on the appropriate box and whisker diagram.
8. The data is divided into 2 mile segments. Each river mile segment includes samples up to and including the upper limit of the river mile interval.
9. Number of samples (n) are shown for each segment.
10. Tributary and Dundee Lake data are excluded from the data sets.

3-1.a 2008 LRC Box and Whisker Plots: 2,3,7,8-TCDD

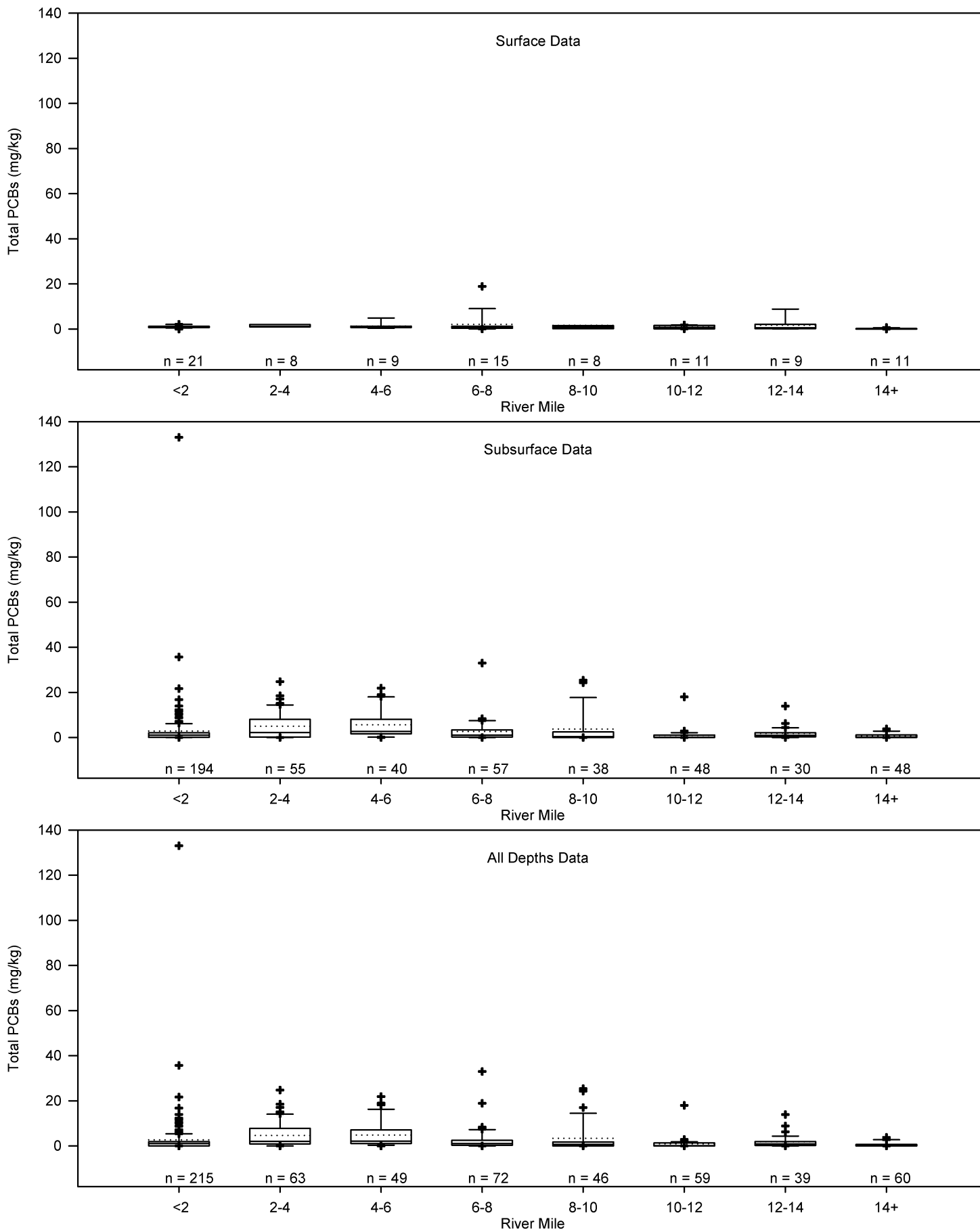


3-1.b 2008 LRC Box and Whisker Plots: Total TEQ



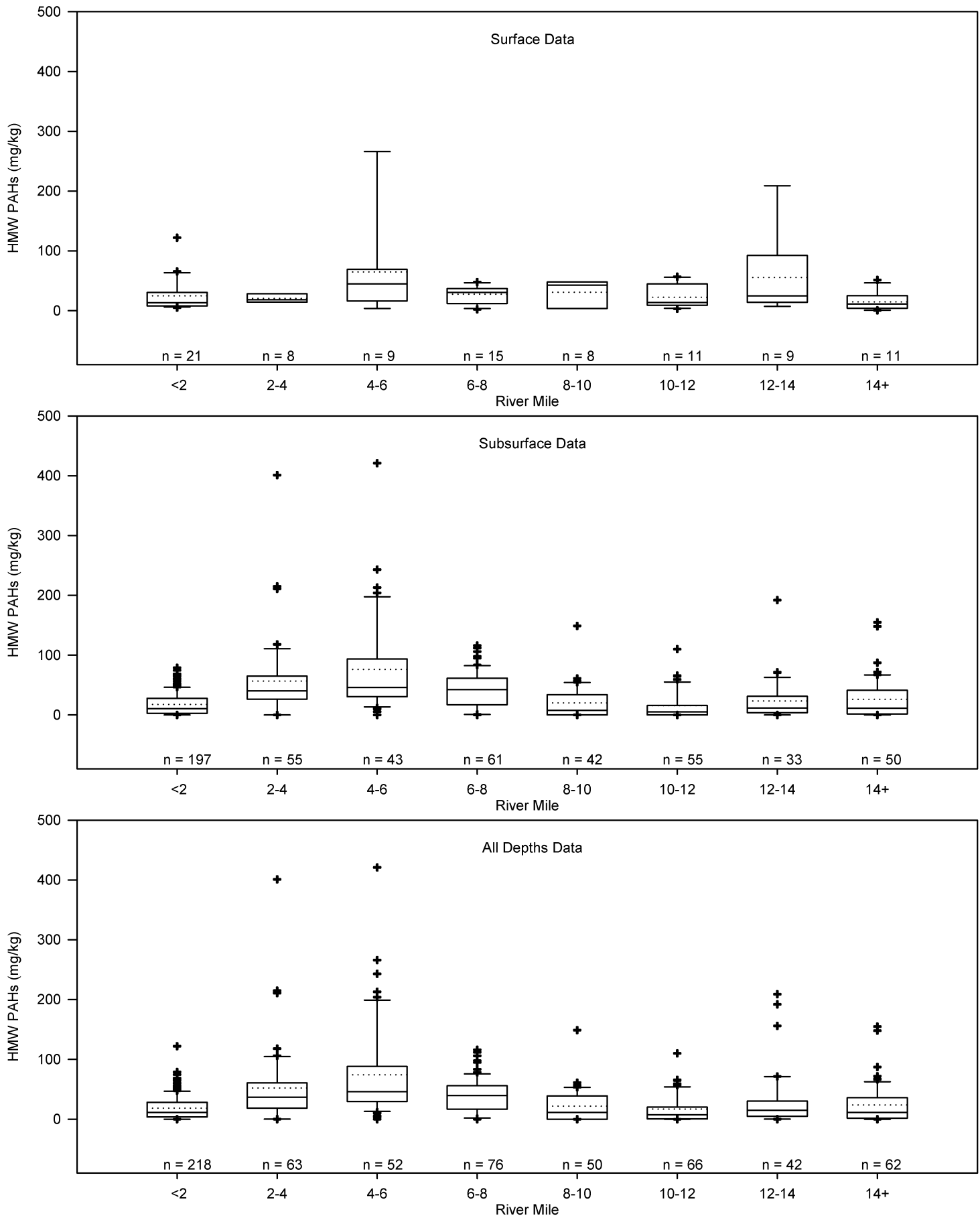
NOTES: Total TEQ = The sum of dioxin, furan, and PCB human health TEQ detects. If all ND, reported as the highest individual TEQ DL.

3-1.c 2008 LRC Box and Whisker Plots: Total PCBs



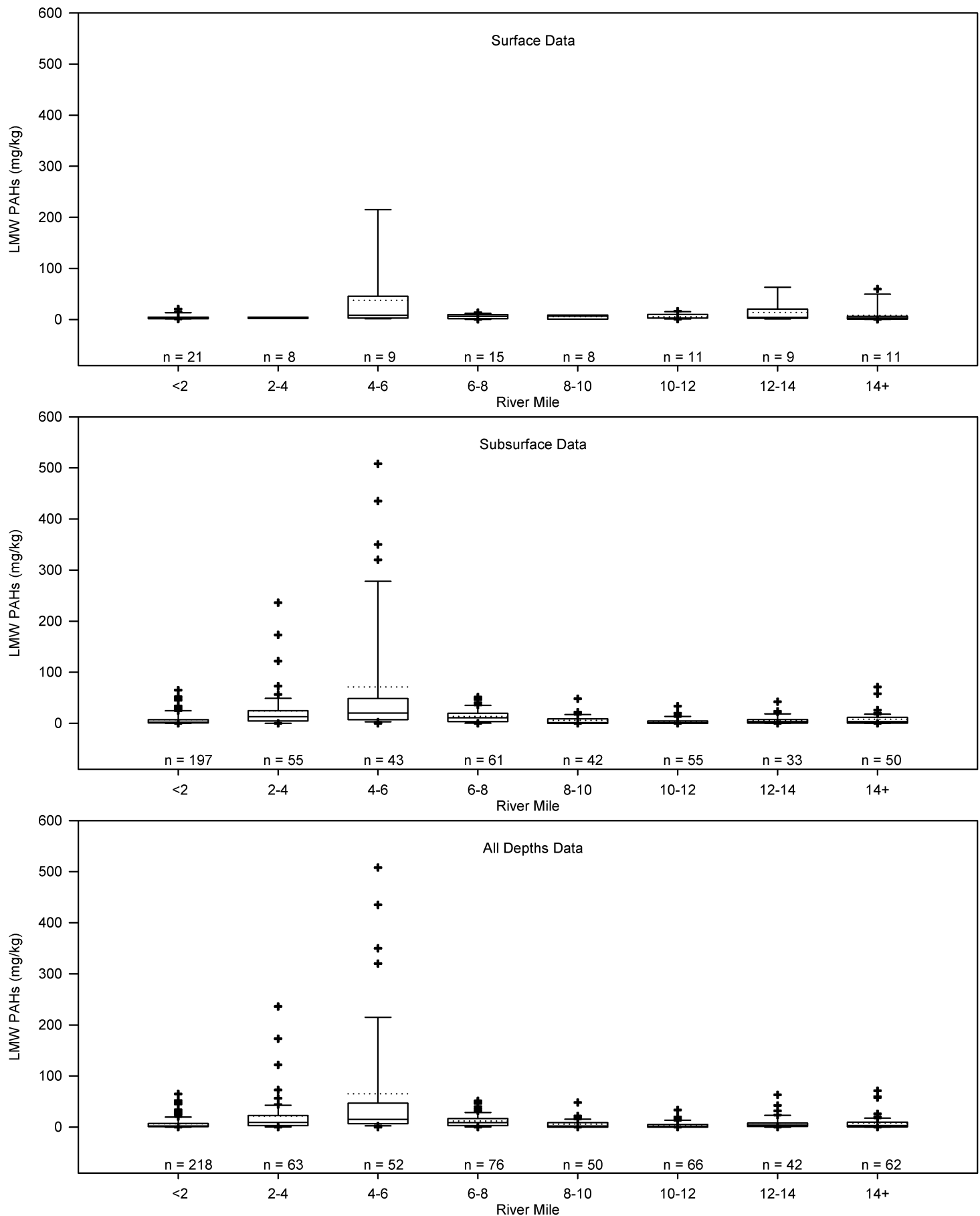
NOTES: Total PCBs = The sum of PCB congener detects; if all ND, reported as the highest individual congener DL.

3-1.d 2008 LRC Box and Whisker Plots: HMW PAHs



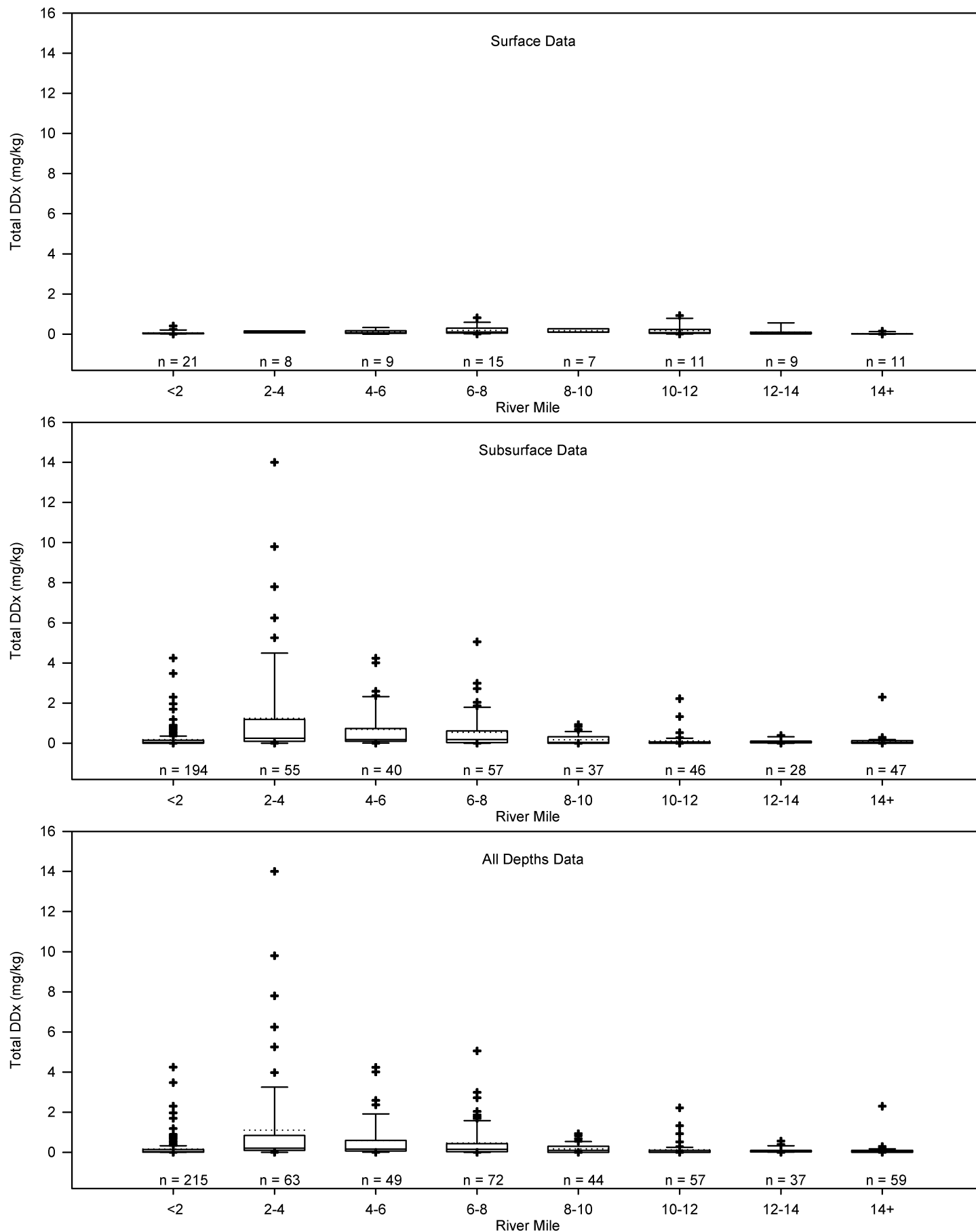
NOTES: Total HMW PAHs = The sum of Benz[a]anthracene, Benzo[a]pyrene, Benzo[b]fluoranthene, Benzo[g,h,i]perylene, Benzo[k]fluoranthene, Chrysene, Dibenzo[a,h]anthracene, Fluoranthene, Indeno[1,2,3-cd]pyrene, and Pyrene detects; if all ND, reported as the highest individual analyte DL.

3-1.e 2008 LRC Box and Whisker Plots: LMW PAHs



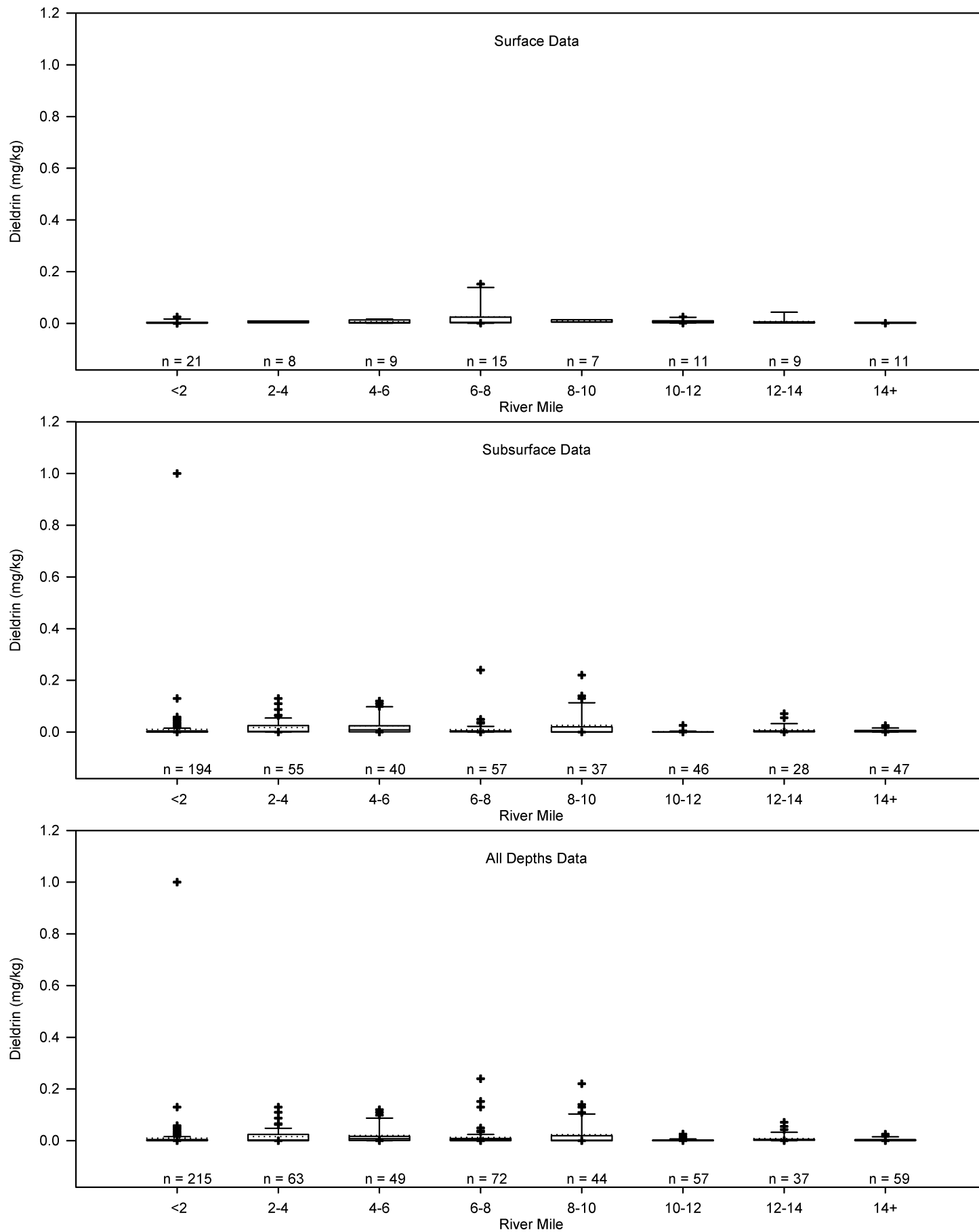
NOTES: Total LMW PAHs = The sum of Acenaphthene, Acenaphthylene, Anthracene, Fluorene, Naphthalene, and Phenanthrene detects; if all ND, reported as the highest individual analyte DL.

3-1.f 2008 LRC Box and Whisker Plots: Total DDx

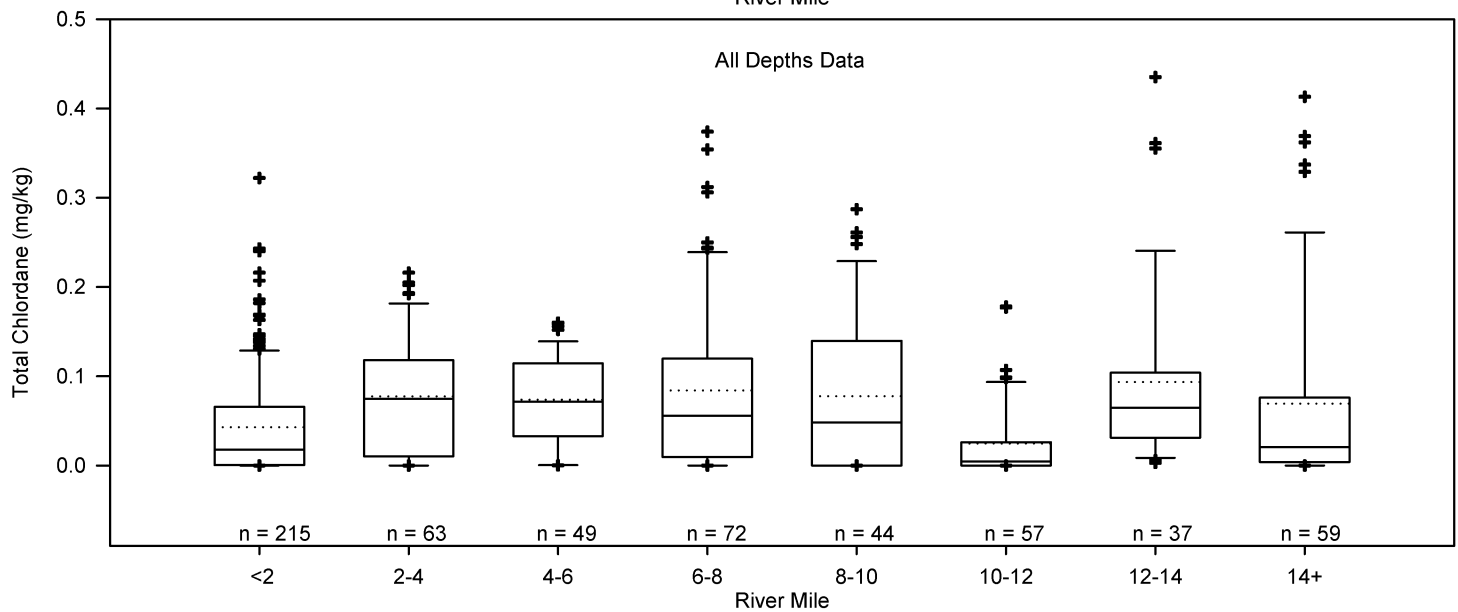
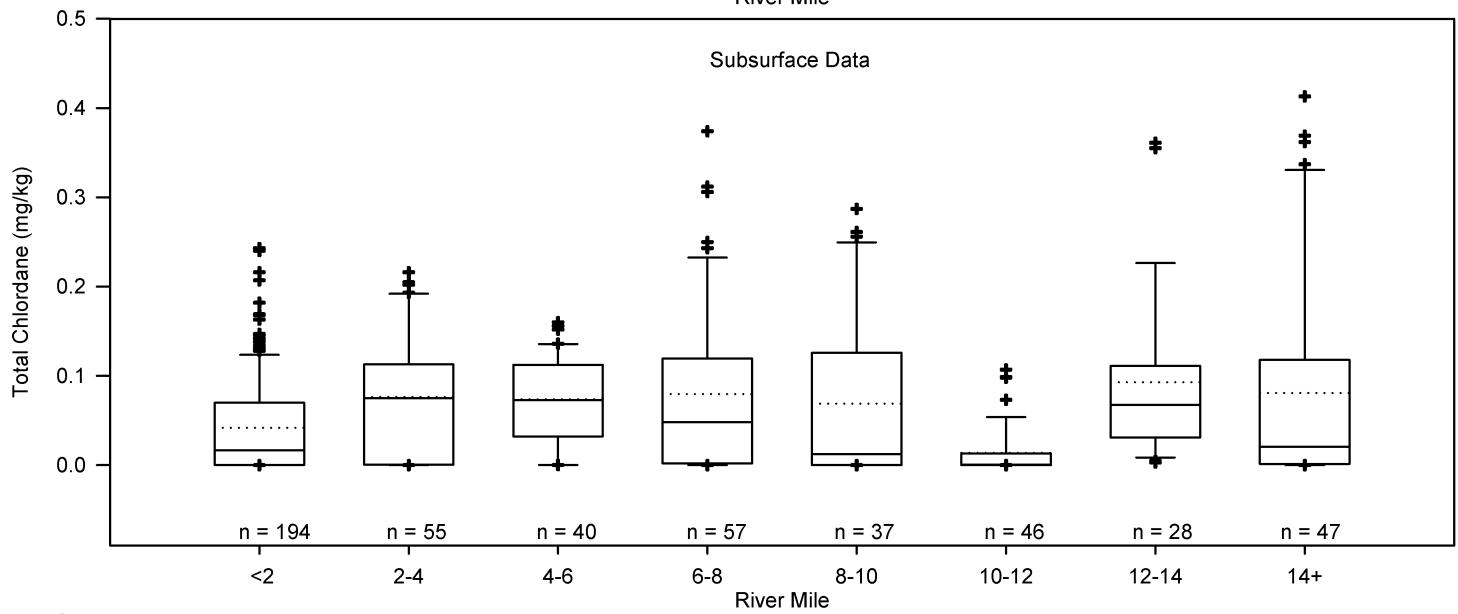
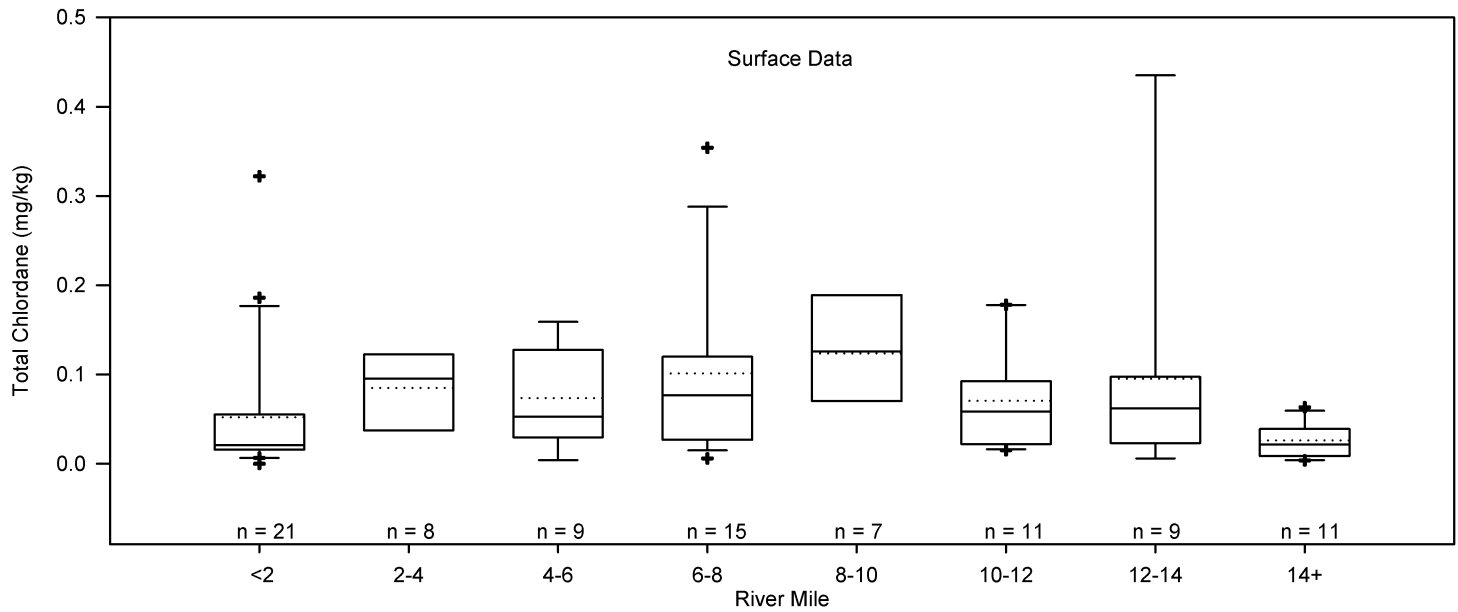


NOTES: Total DDx = The sum of the 4,4'-DDD, 4,4'-DDE, and 4,4'-DDT detects;
if all ND, reported as the highest individual analyte DL.

3-1.g 2008 LRC Box and Whisker Plots: Dieldrin

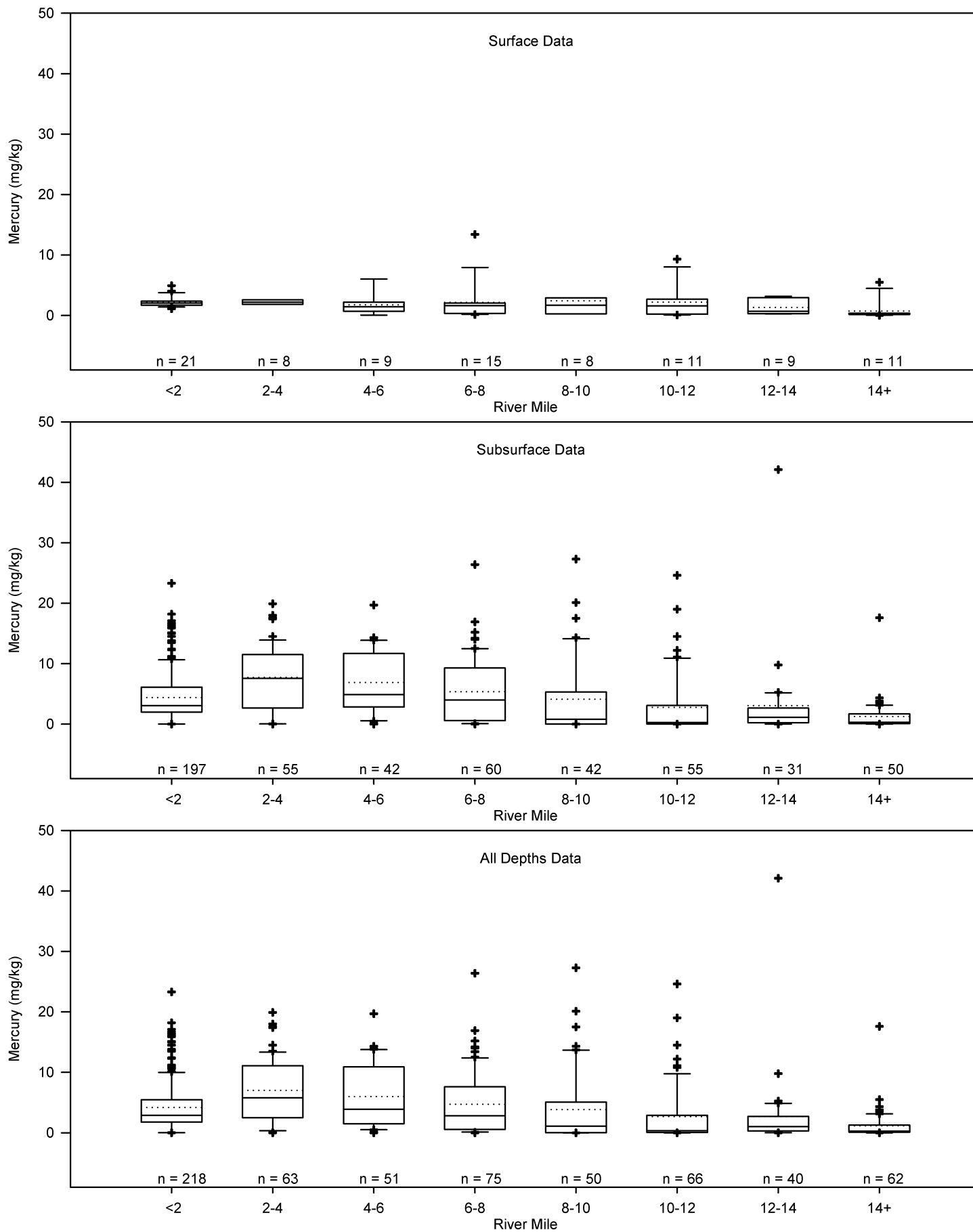


3-1.h 2008 LRC Box and Whisker Plots: Total Chlordane

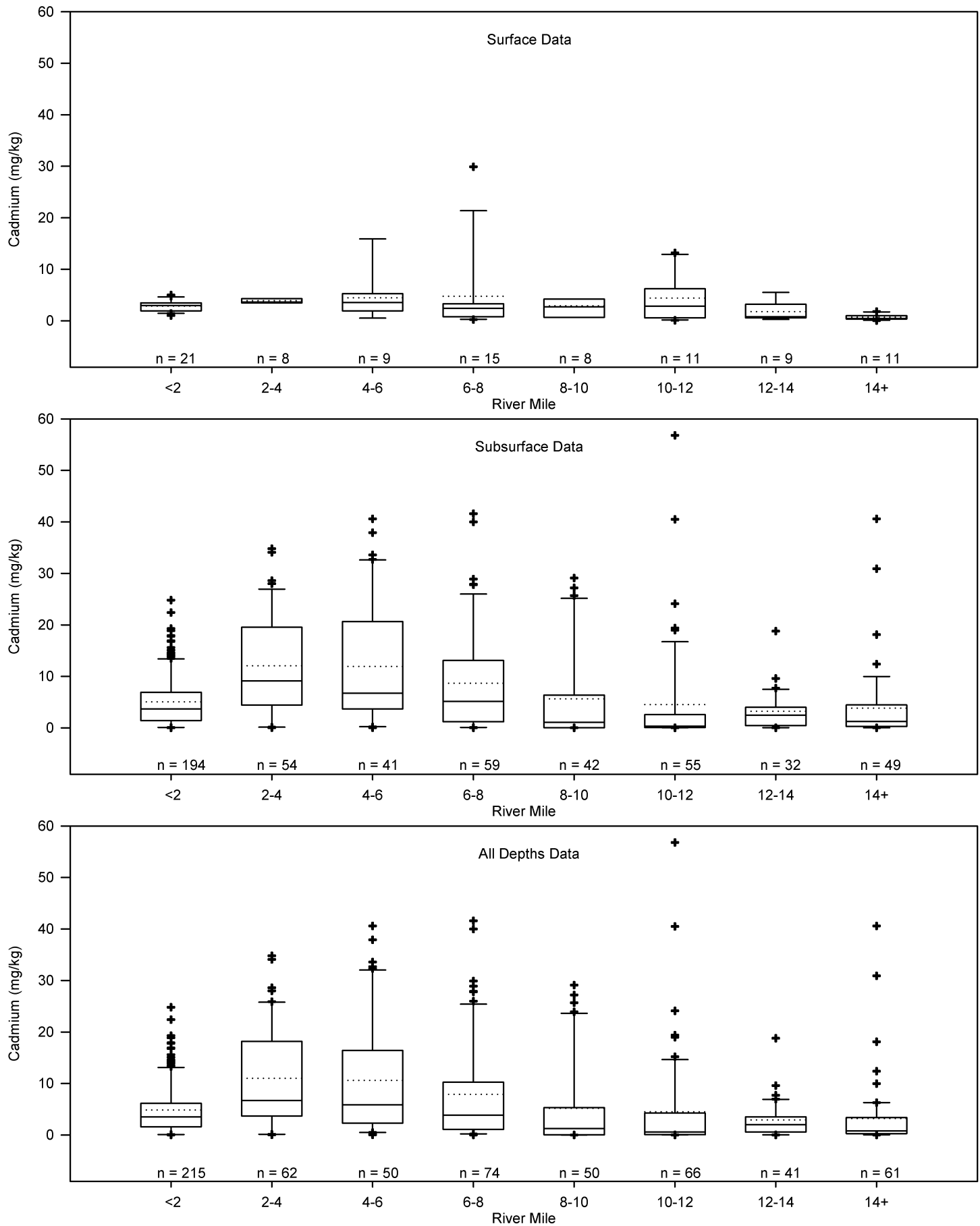


NOTES: Total Chlordane = The sum of cis-Chlordane, oxy-Chlordane, trans-Chlordane, cis-Nonachlor, trans-Nonachlor detects.
If all ND, reported as the highest individual analyte DL.

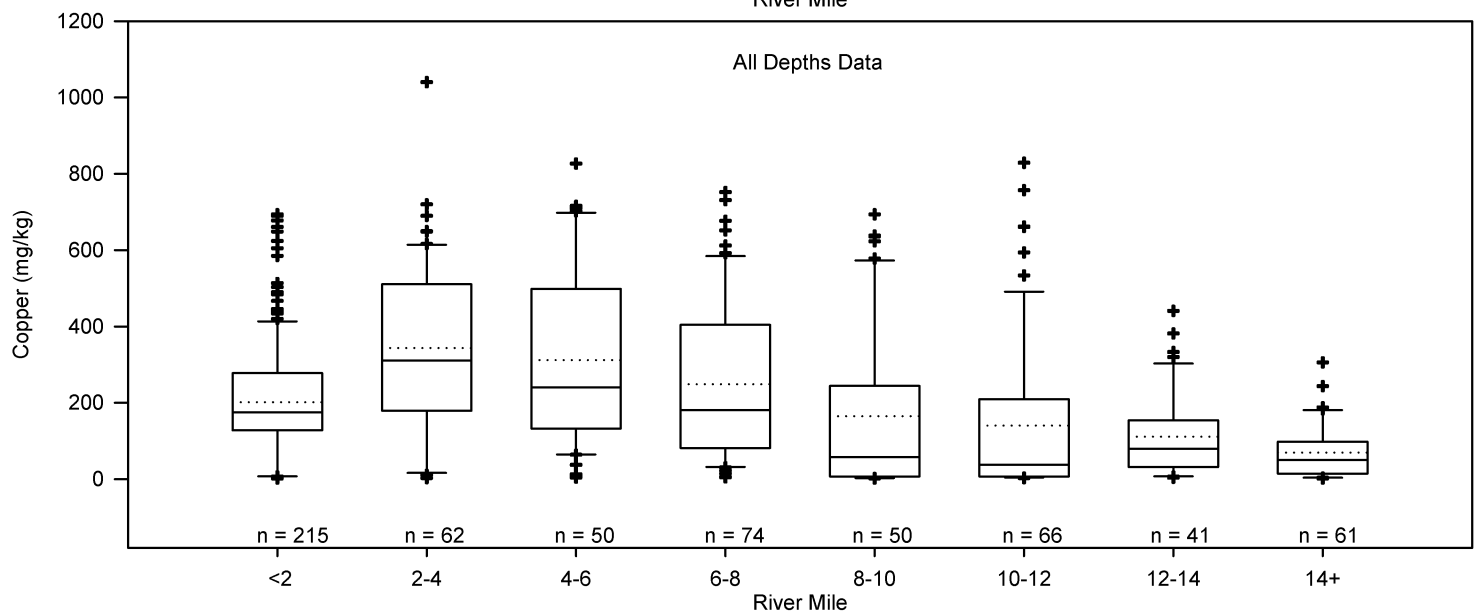
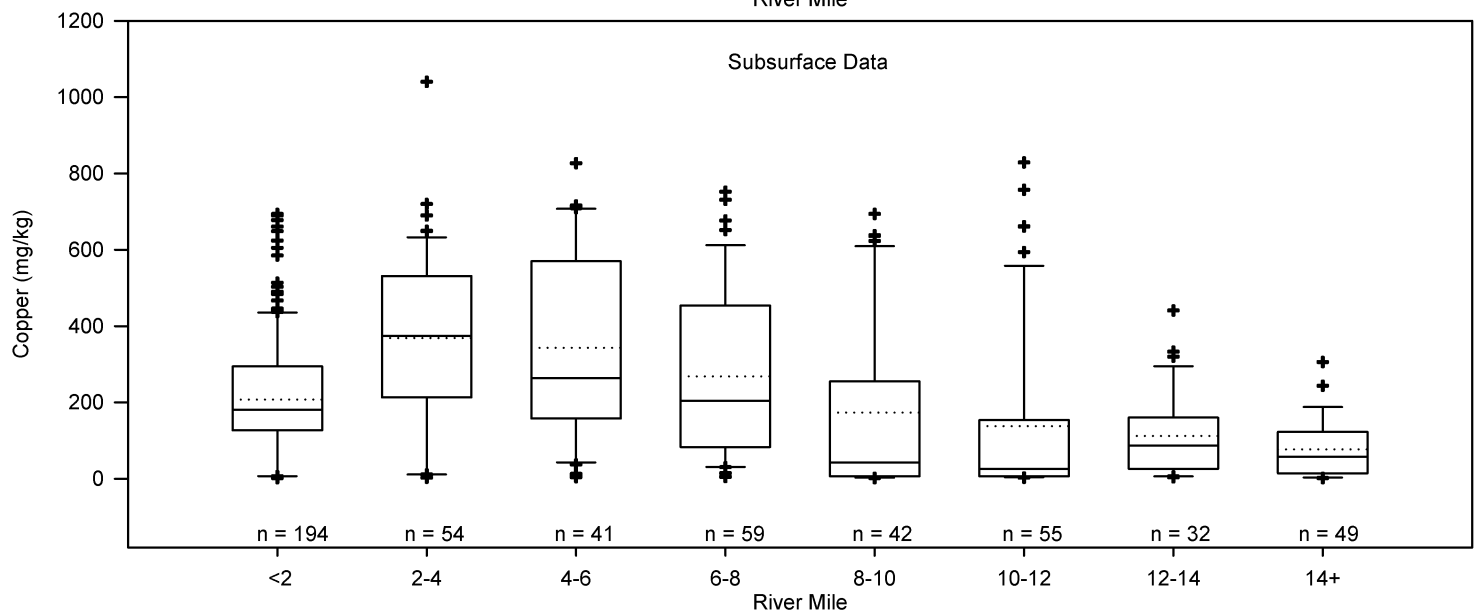
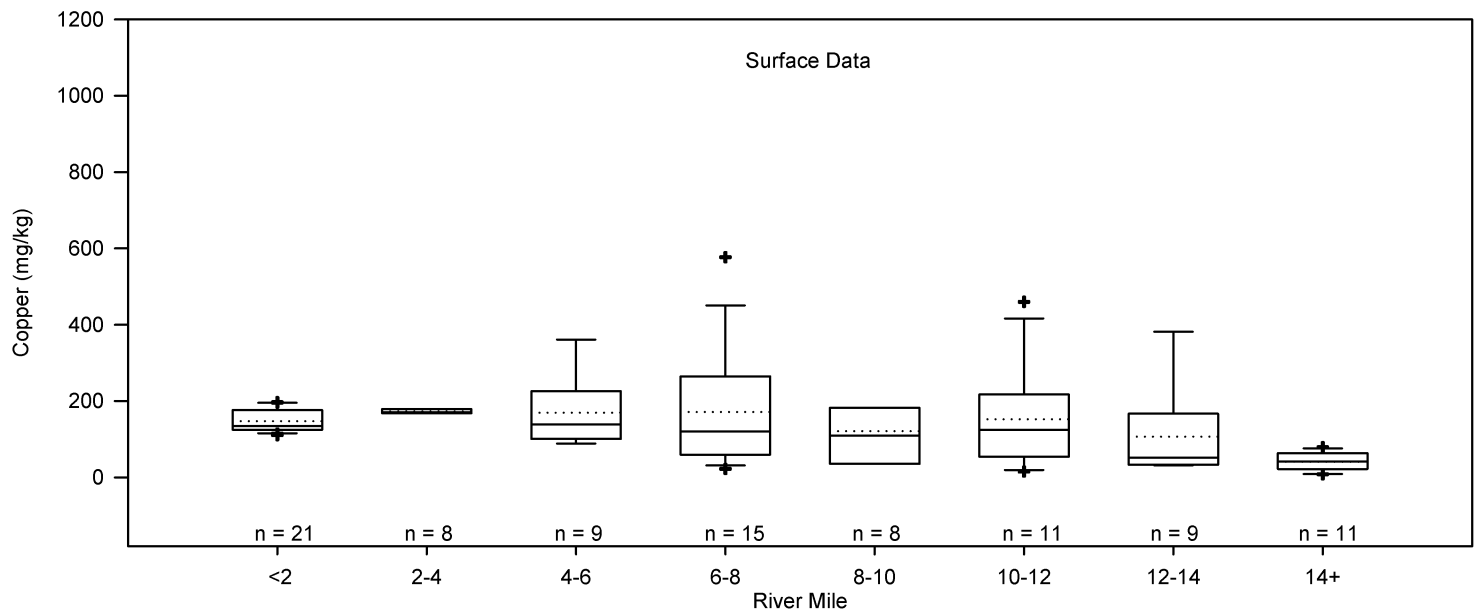
3-1.i 2008 LRC Box and Whisker Plots: Mercury



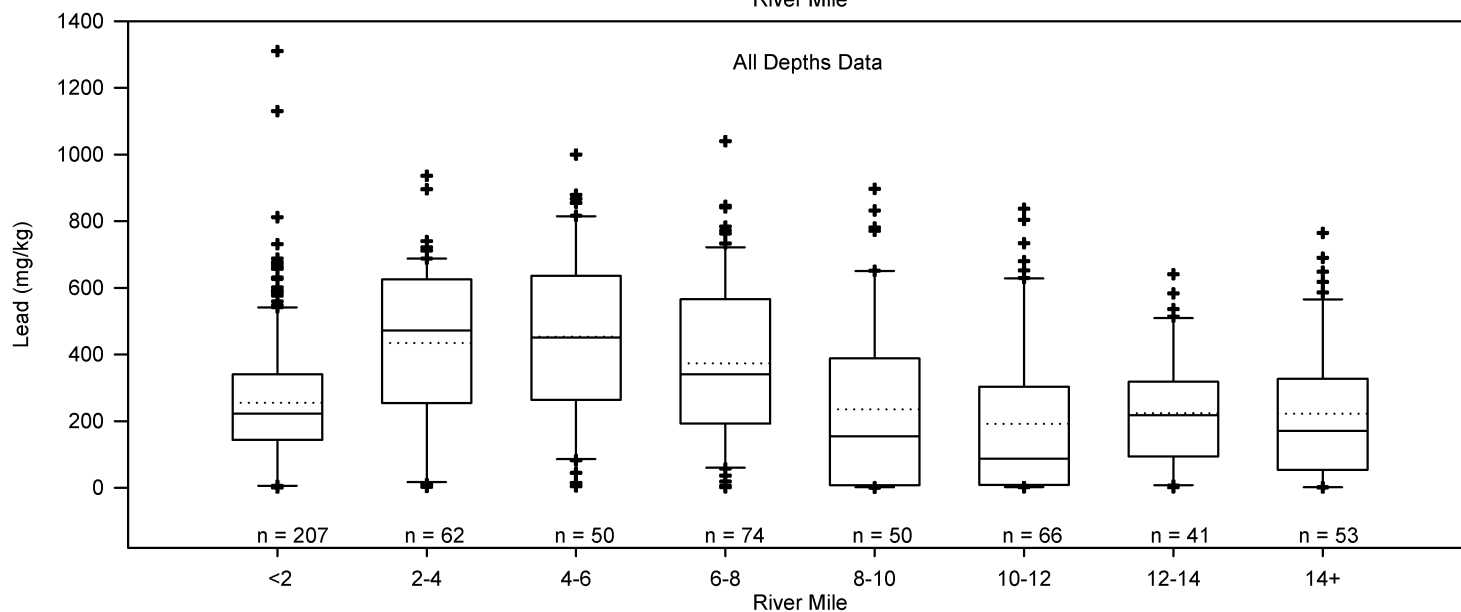
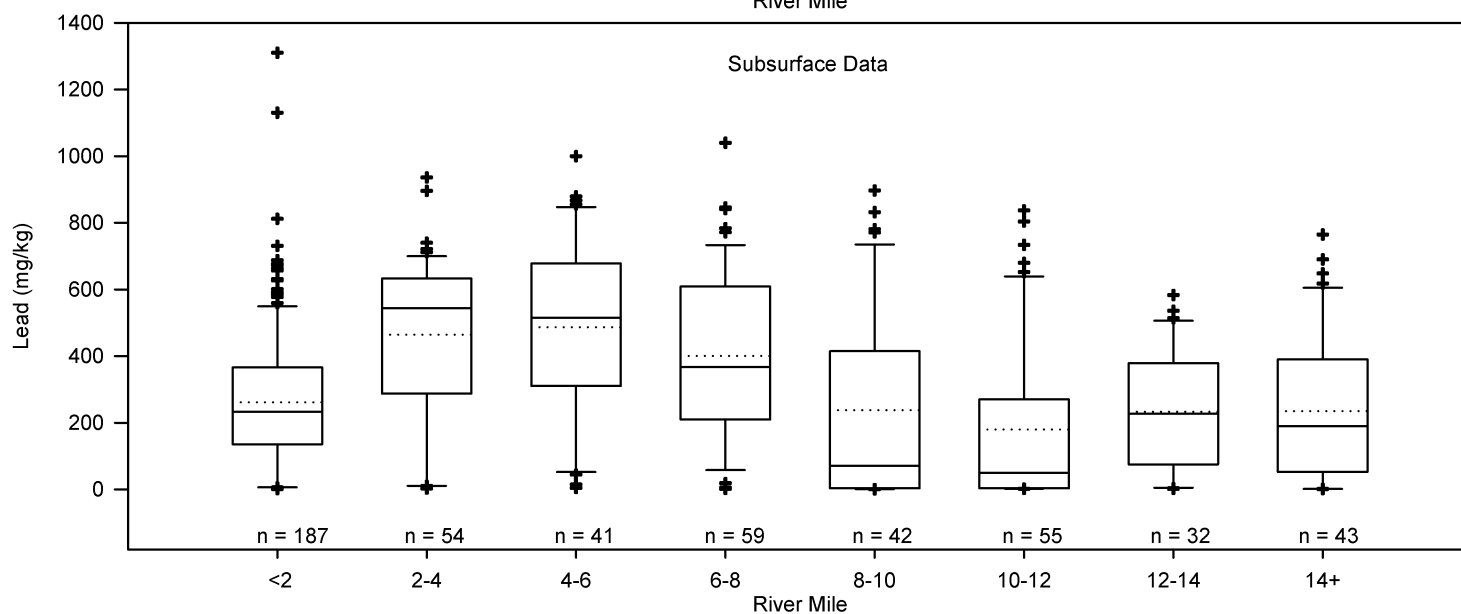
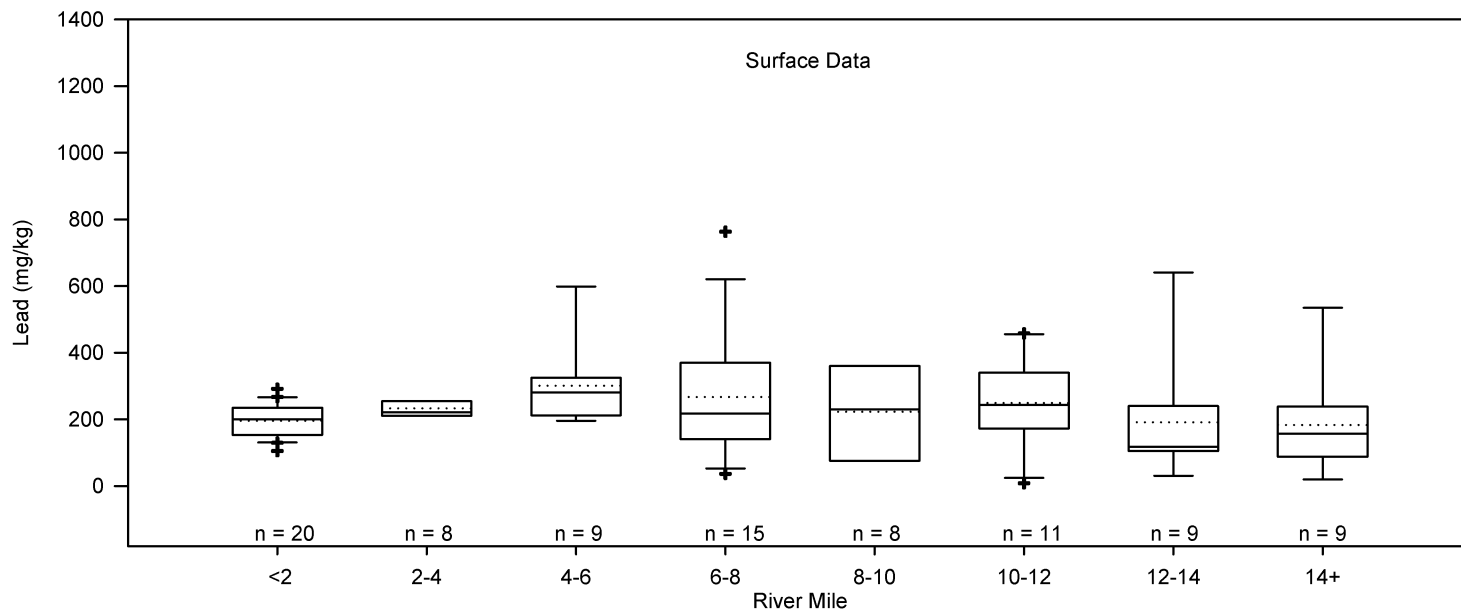
3-1.j 2008 LRC Box and Whisker Plots: Cadmium



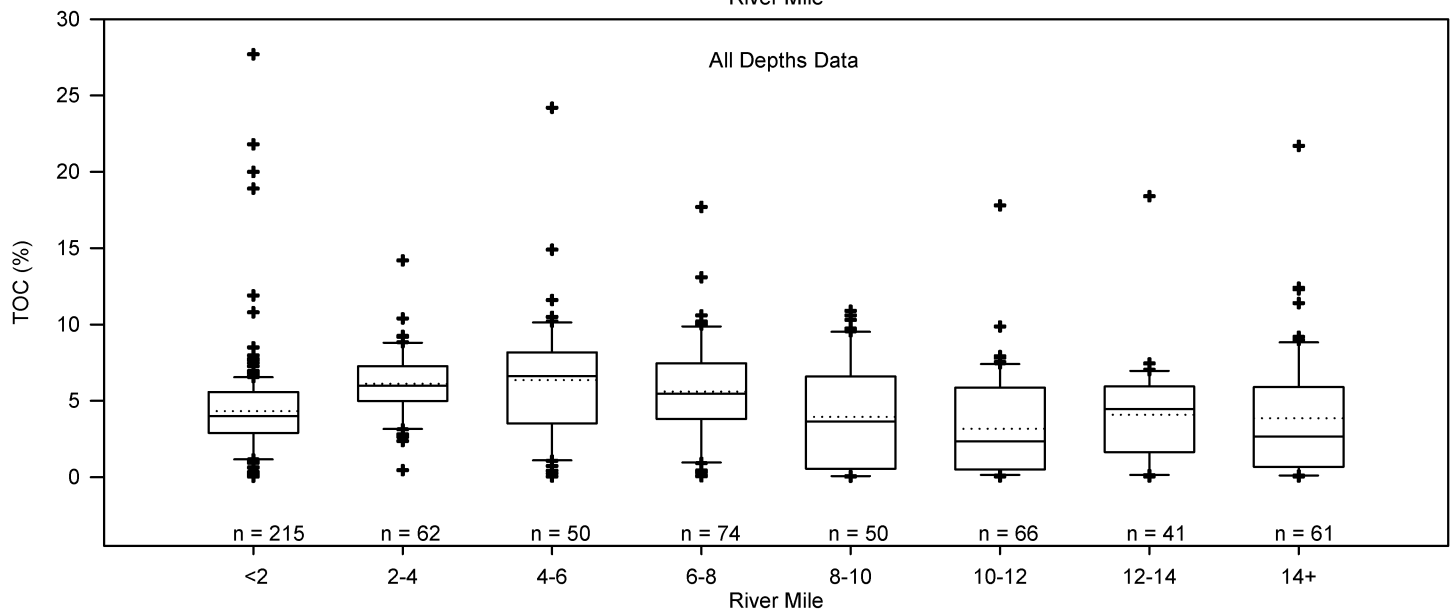
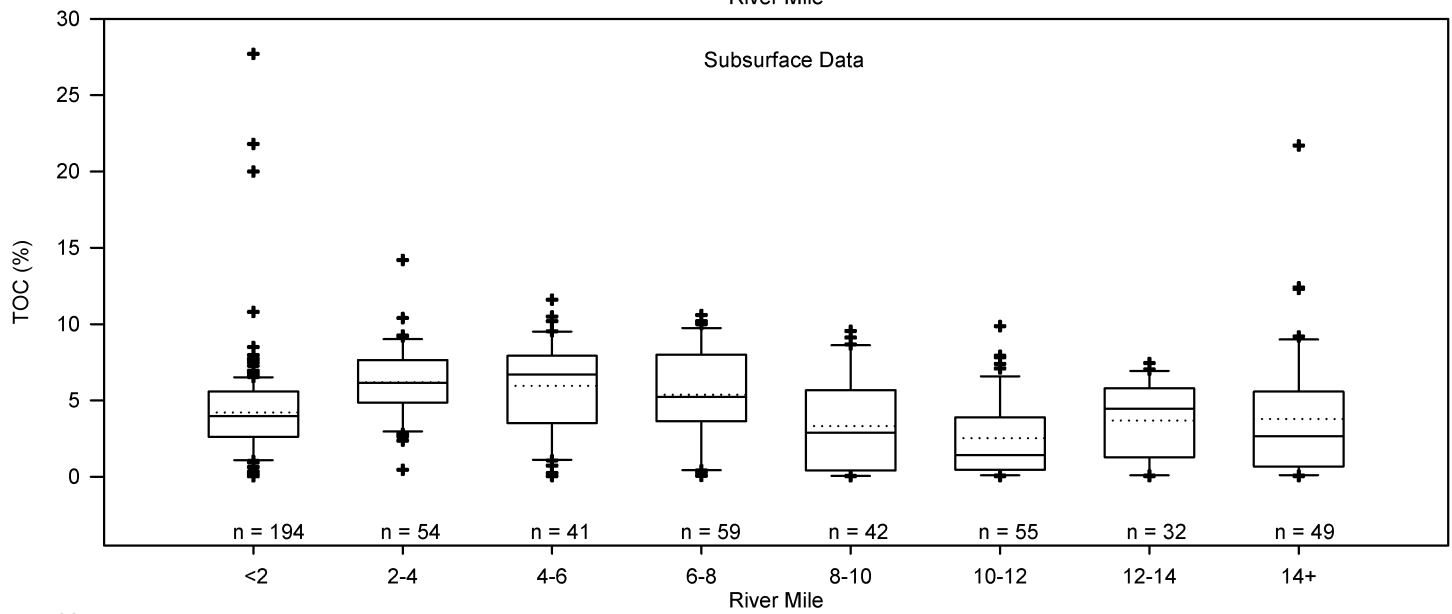
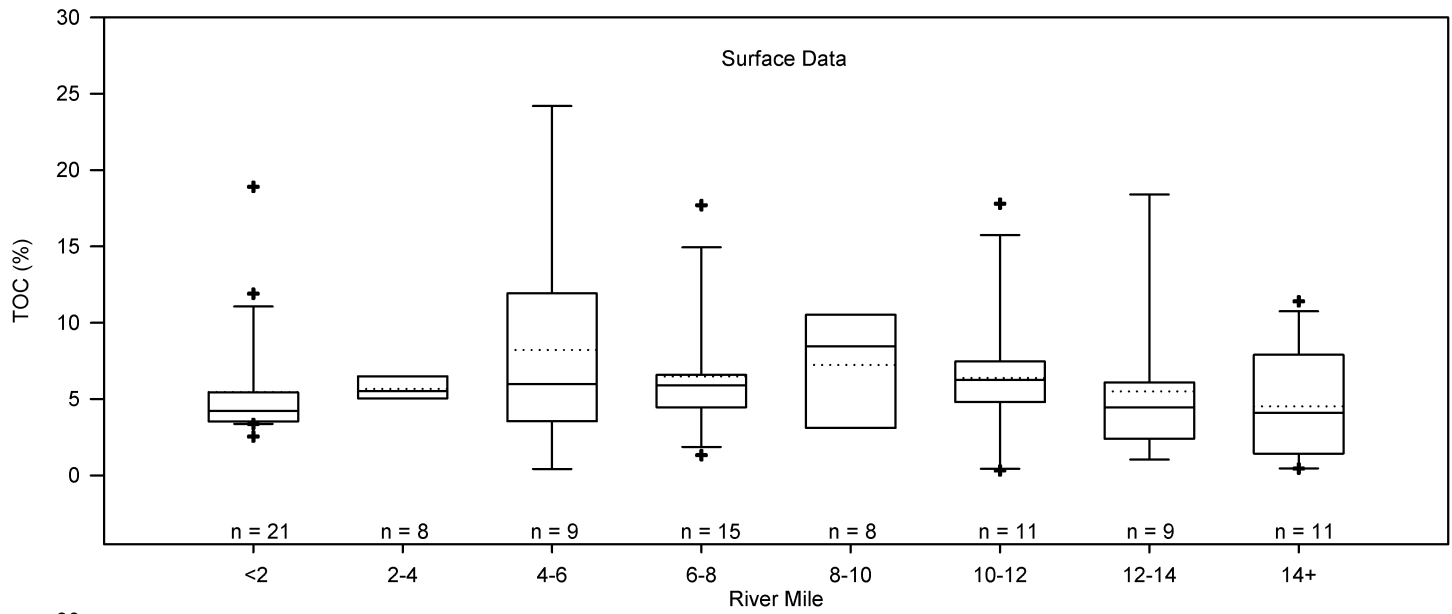
3-1.k 2008 LRC Box and Whisker Plots: Copper



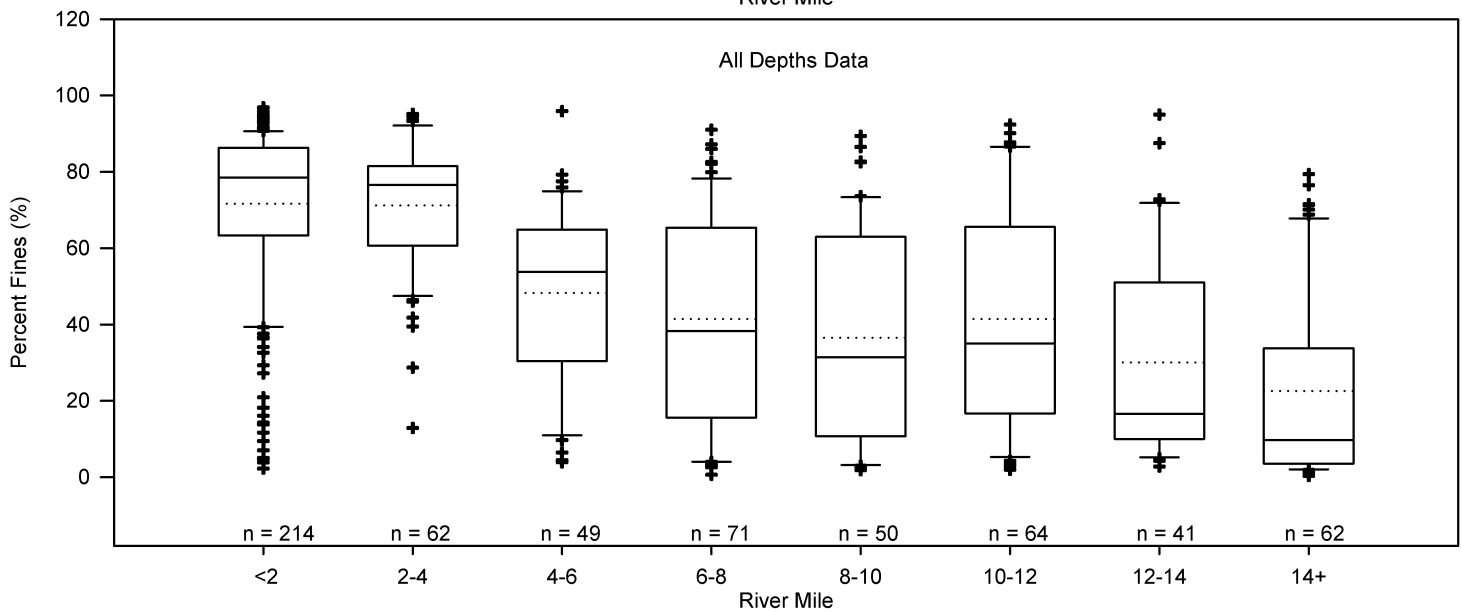
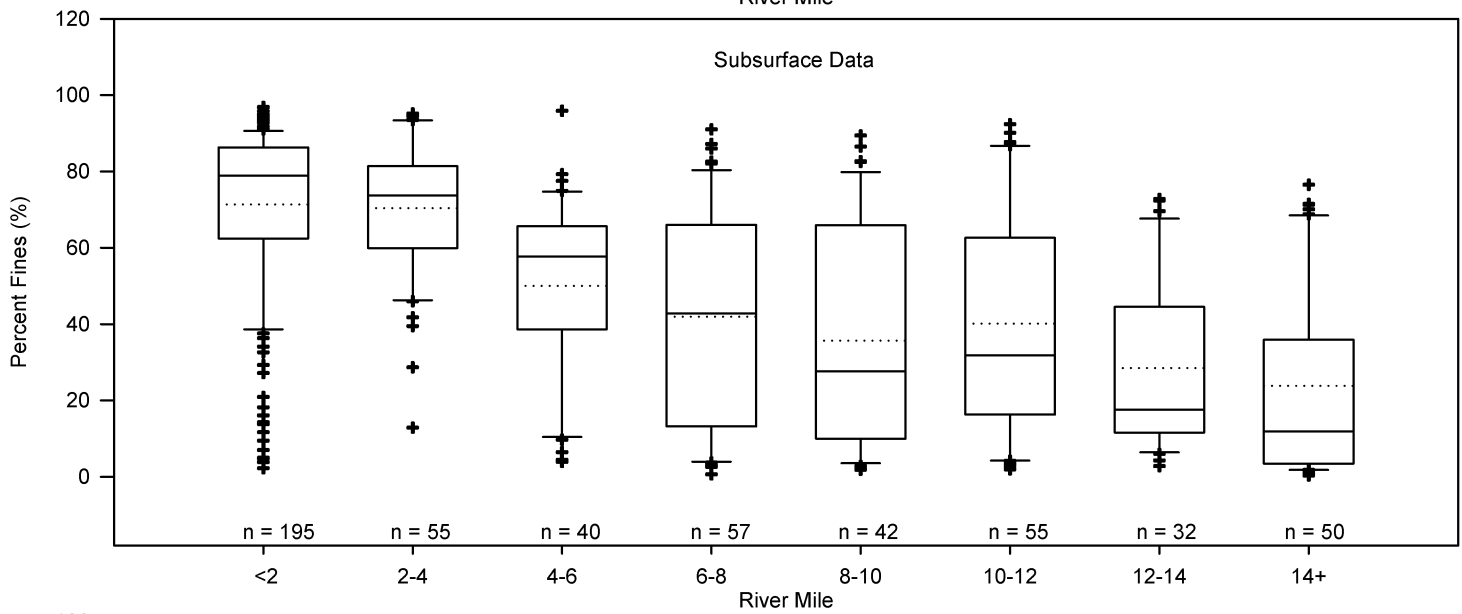
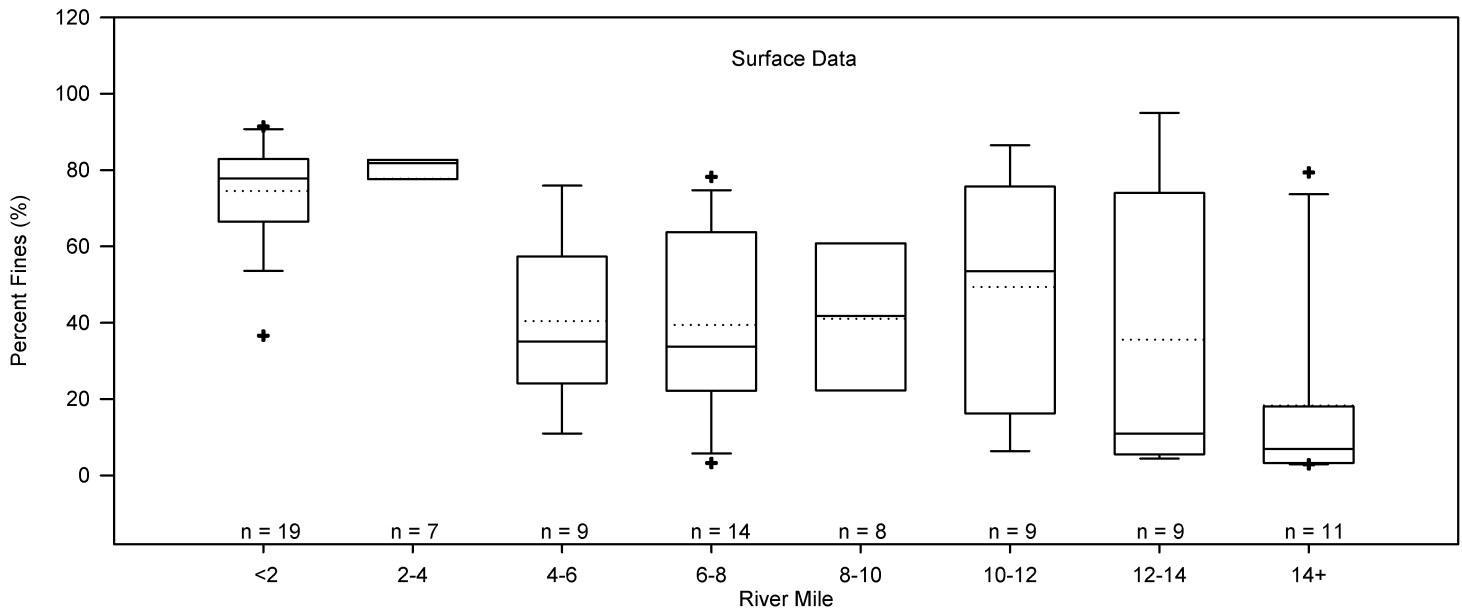
3-1.I 2008 LRC Box and Whisker Plots: Lead



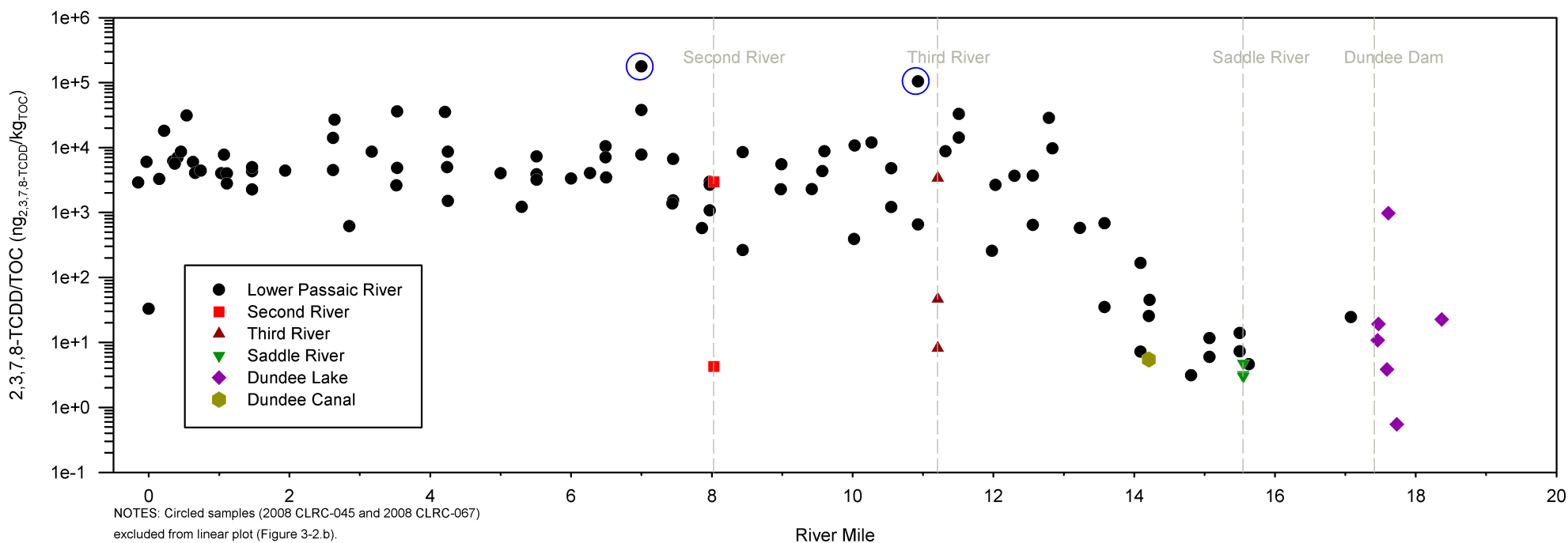
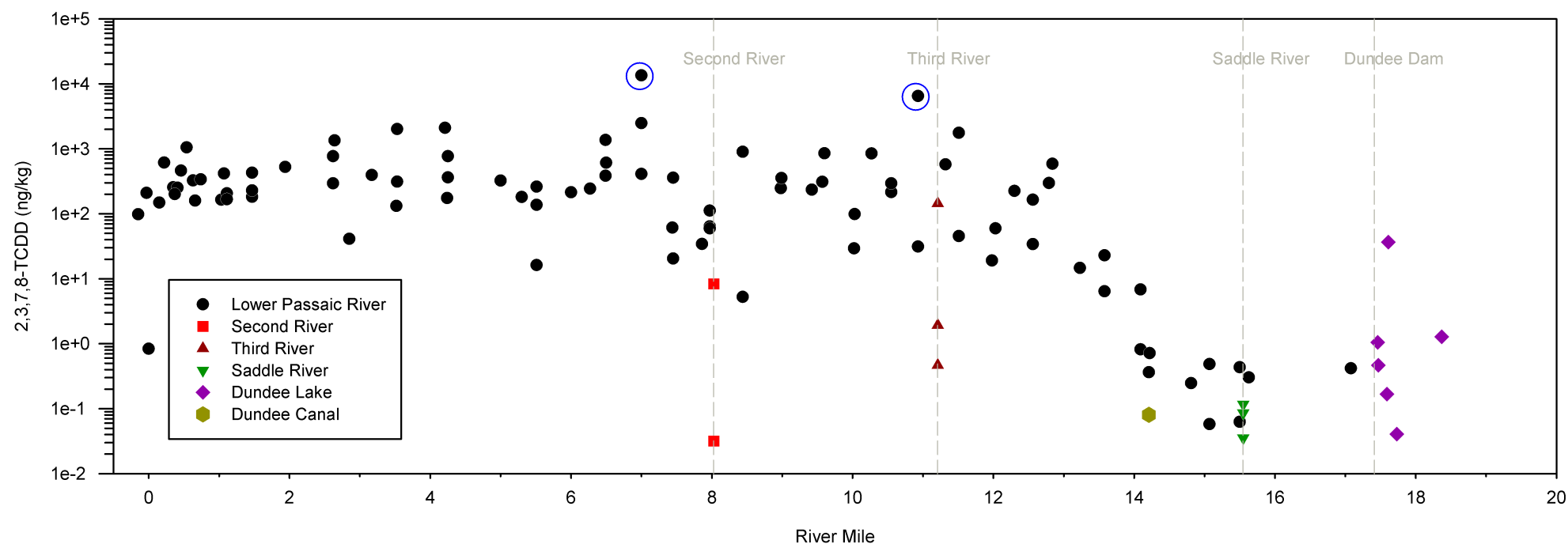
3-1.m 2008 LRC Box and Whisker Plots: TOC



3-1.n 2008 LRC Box and Whisker Plots: Percent Fines

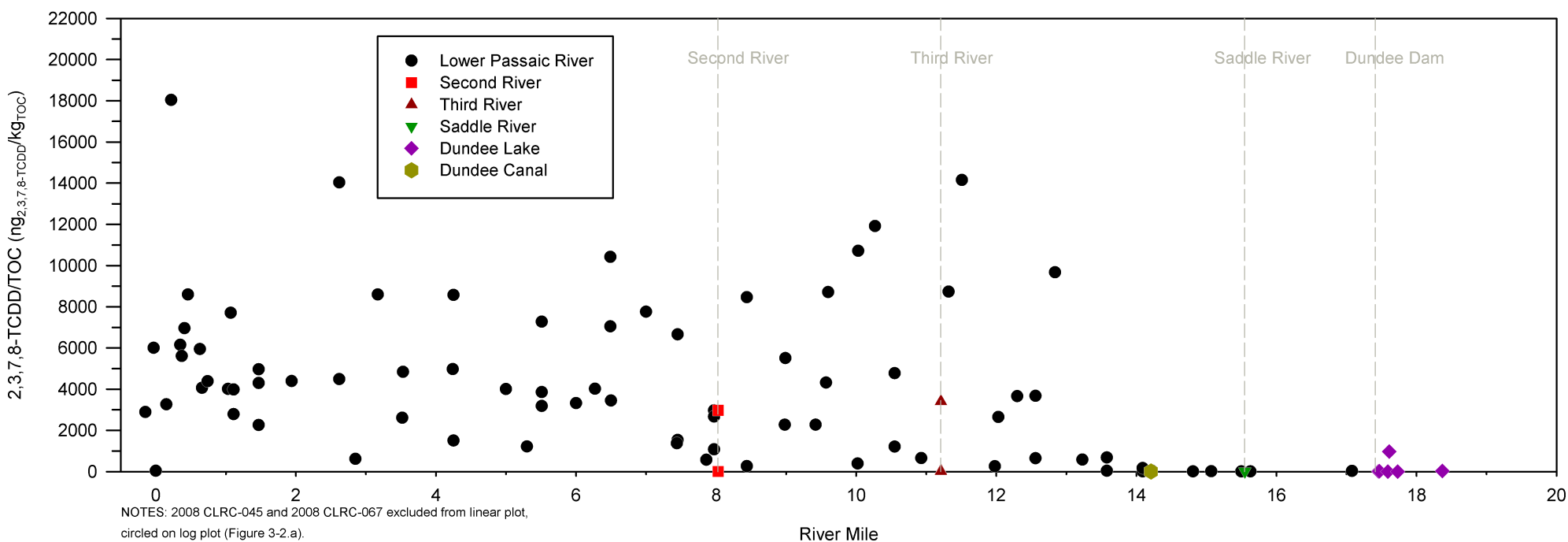
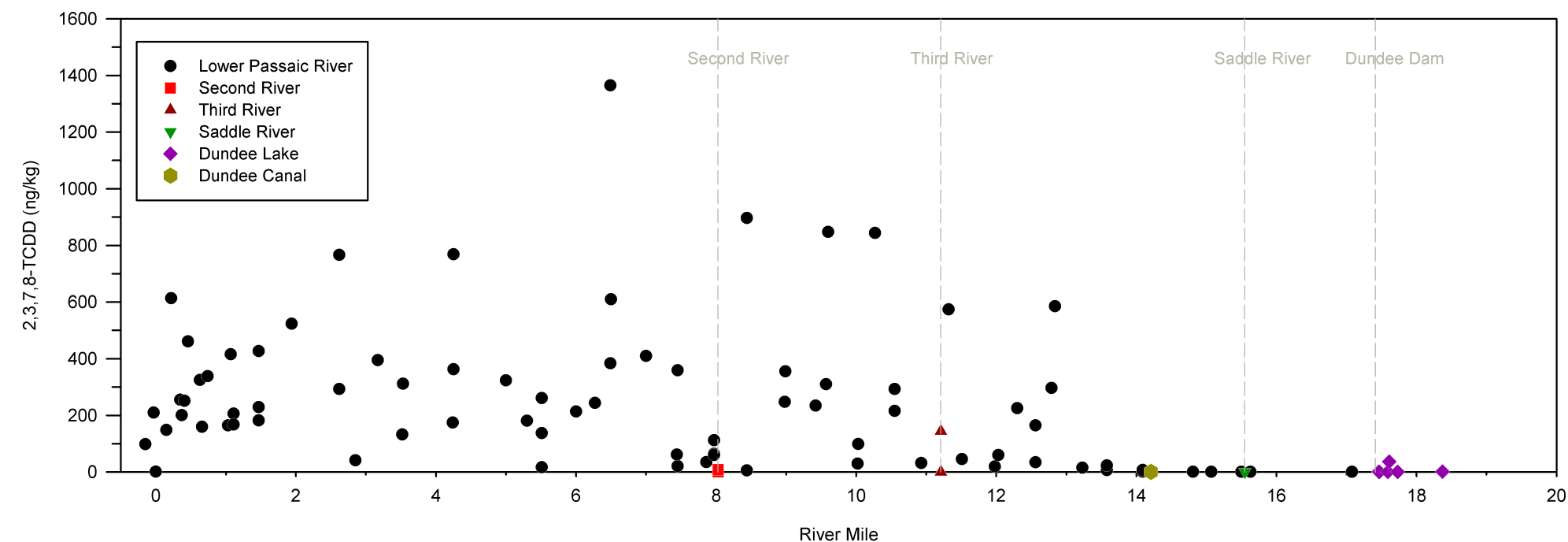


3-2.a Surficial Concentration vs. River Mile, Log Scale - 2,3,7,8-TCDD
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only

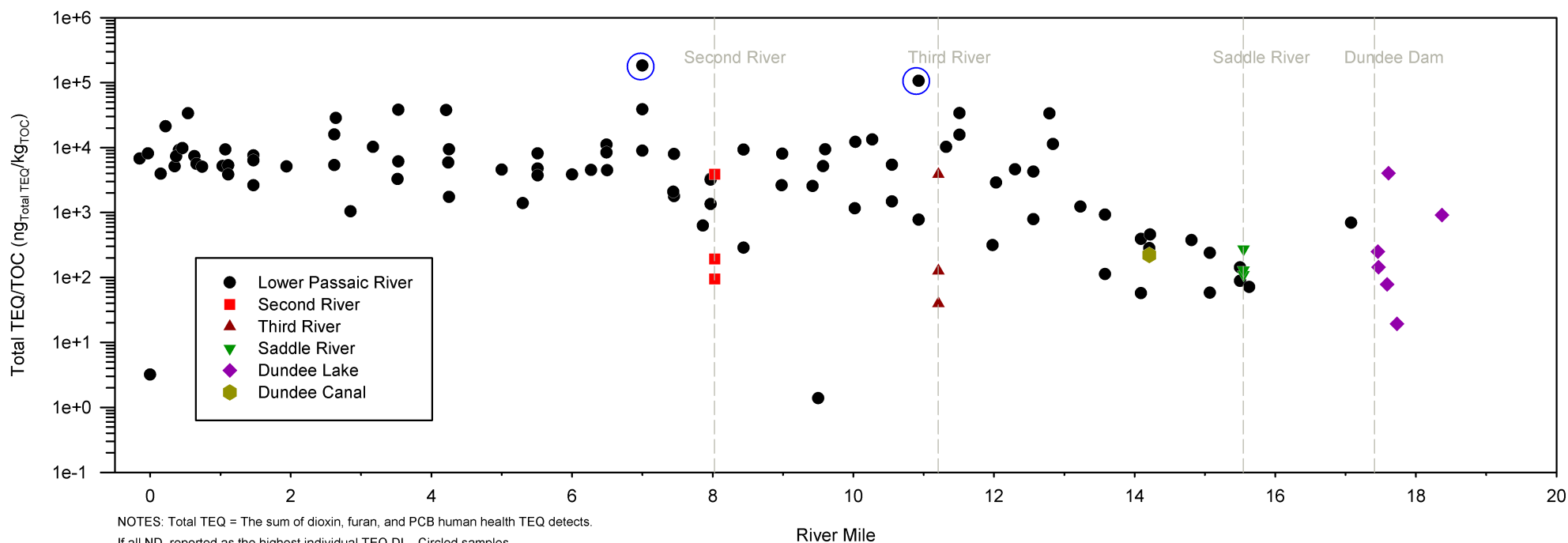
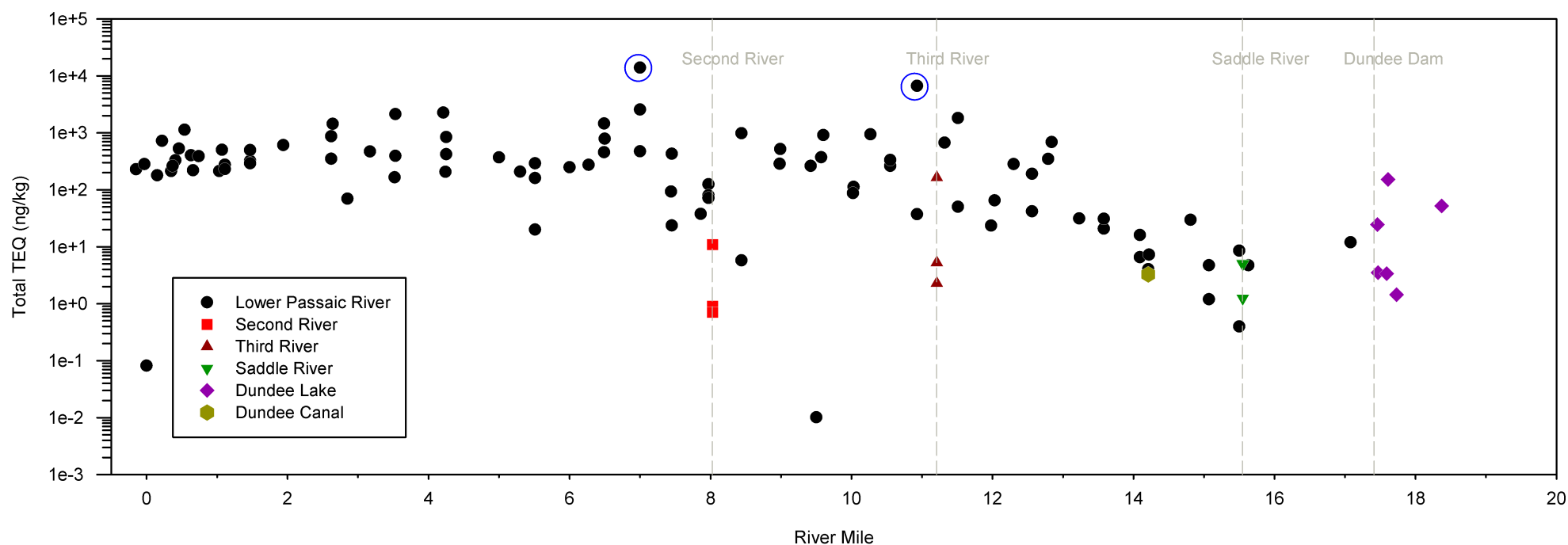


NOTES: Circled samples (2008 CLRC-045 and 2008 CLRC-067)
 excluded from linear plot (Figure 3-2.b).

3-2.b Surficial Concentration vs. River Mile, Linear Scale - 2,3,7,8-TCDD
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



3-2.c Surficial Concentration vs. River Mile, Log Scale - Total TEQ
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only

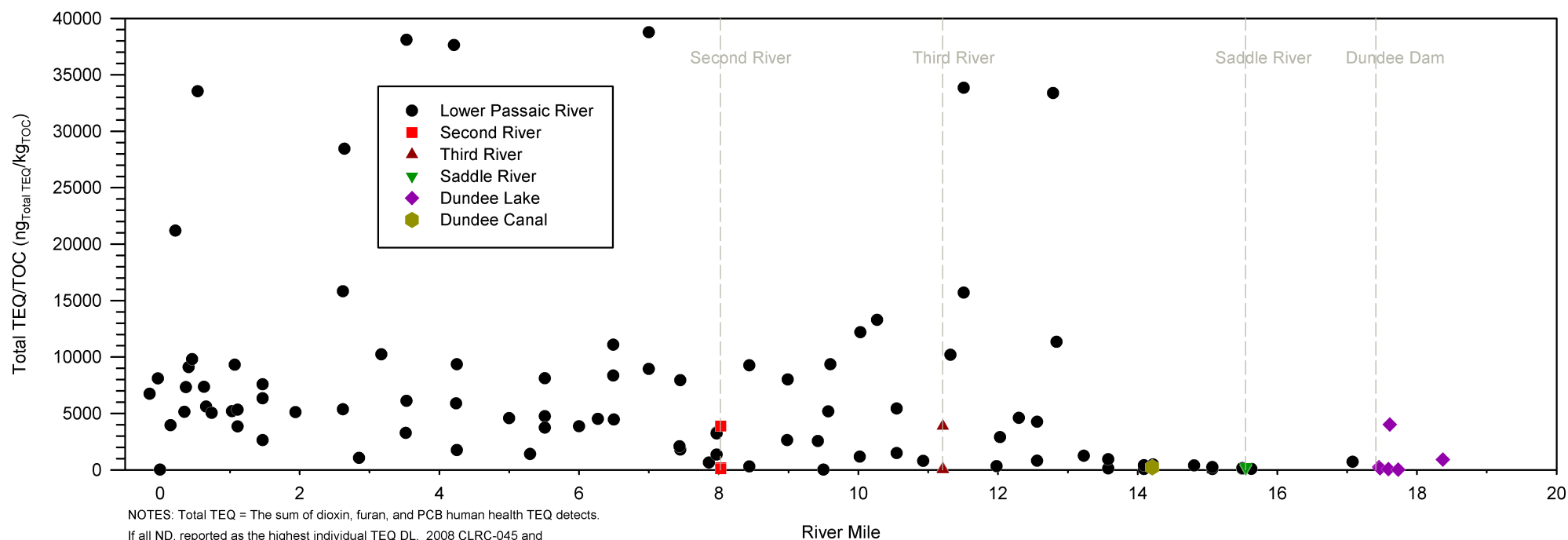
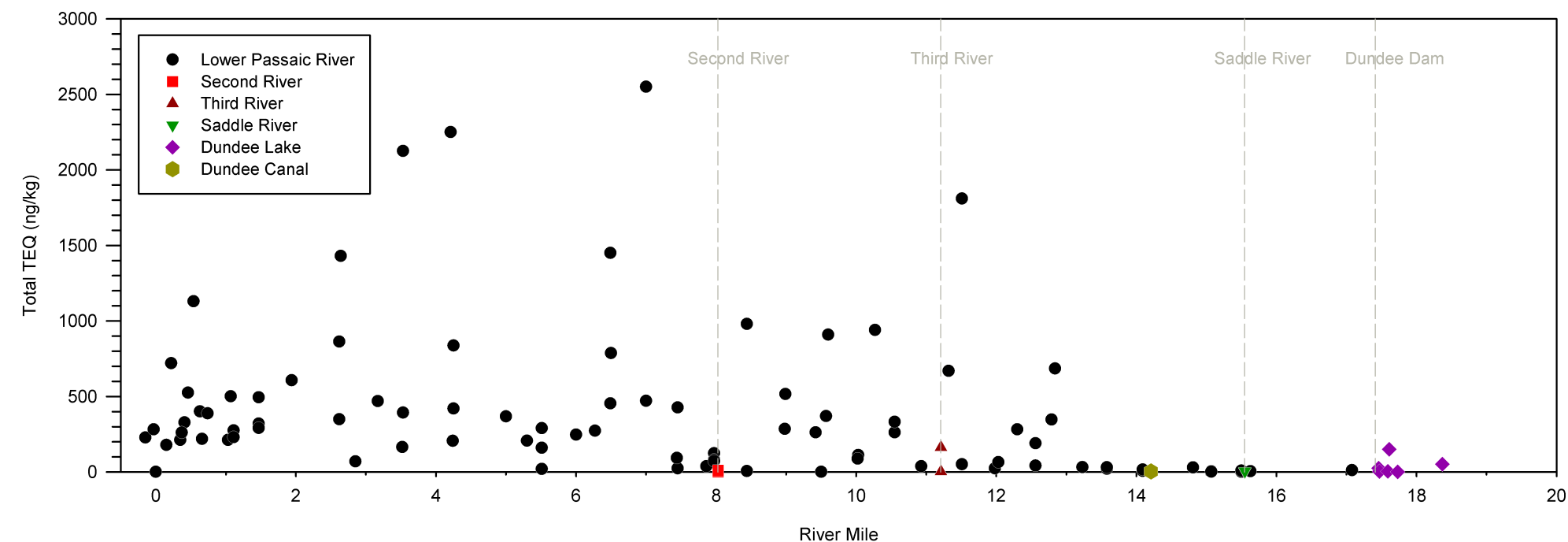


NOTES: Total TEQ = The sum of dioxin, furan, and PCB human health TEQ detects.

If all ND, reported as the highest individual TEQ DL. Circled samples

(2008 CLRC-045 and 2008 CLRC-067 excluded from linear plot (Figure 3-2.d).

3-2.d Surficial Concentration vs. River Mile, Linear Scale - Total TEQ
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only

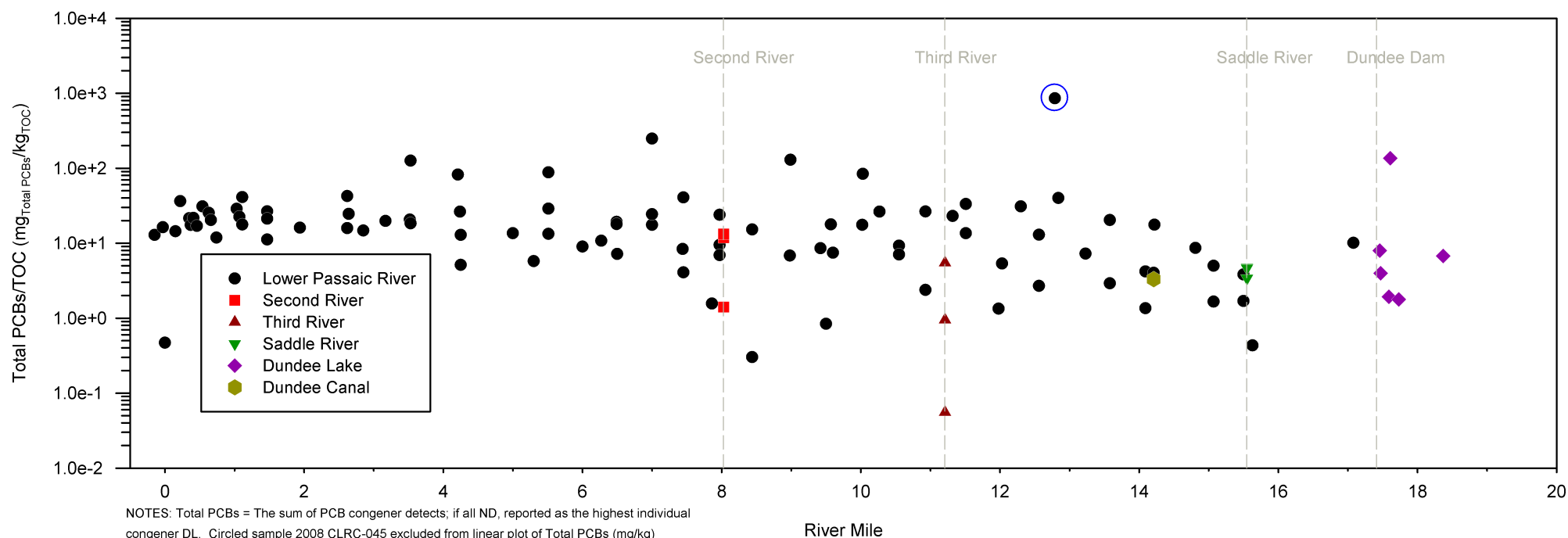
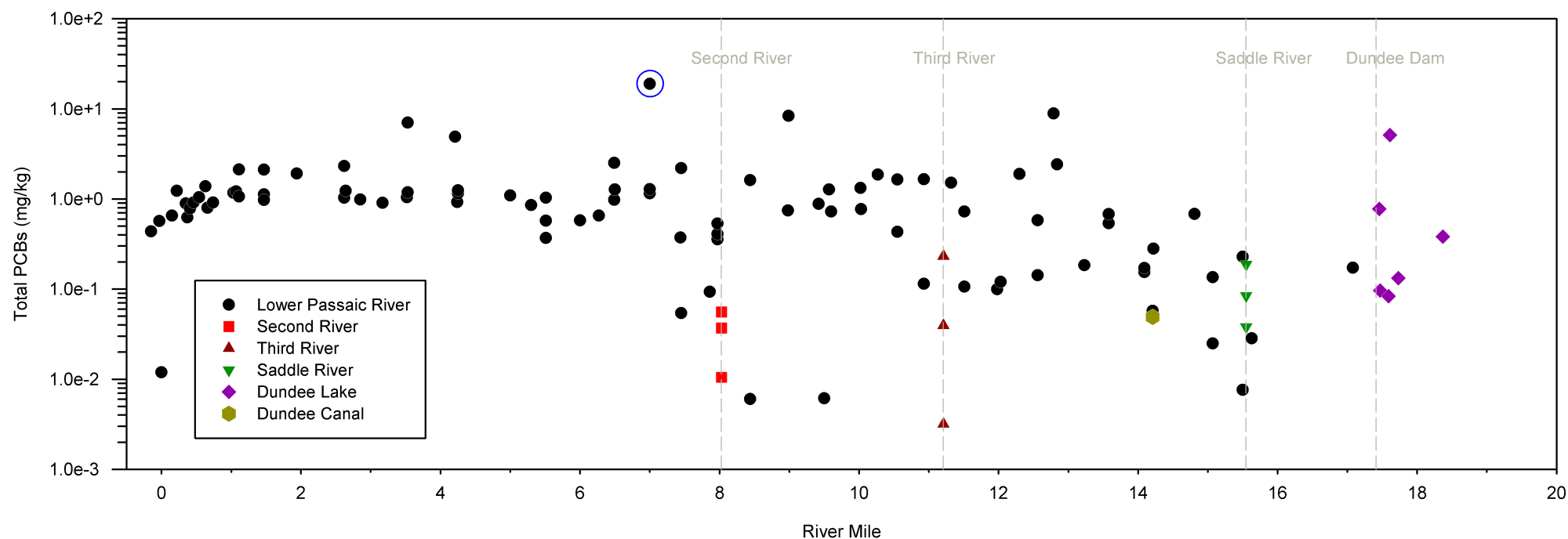


NOTES: Total TEQ = The sum of dioxin, furan, and PCB human health TEQ detects.

If all ND, reported as the highest individual TEQ DL. 2008 CLRC-045 and

2008 CLRC-067 excluded from linear plot, circled on log plot (Figure 3-2.c).

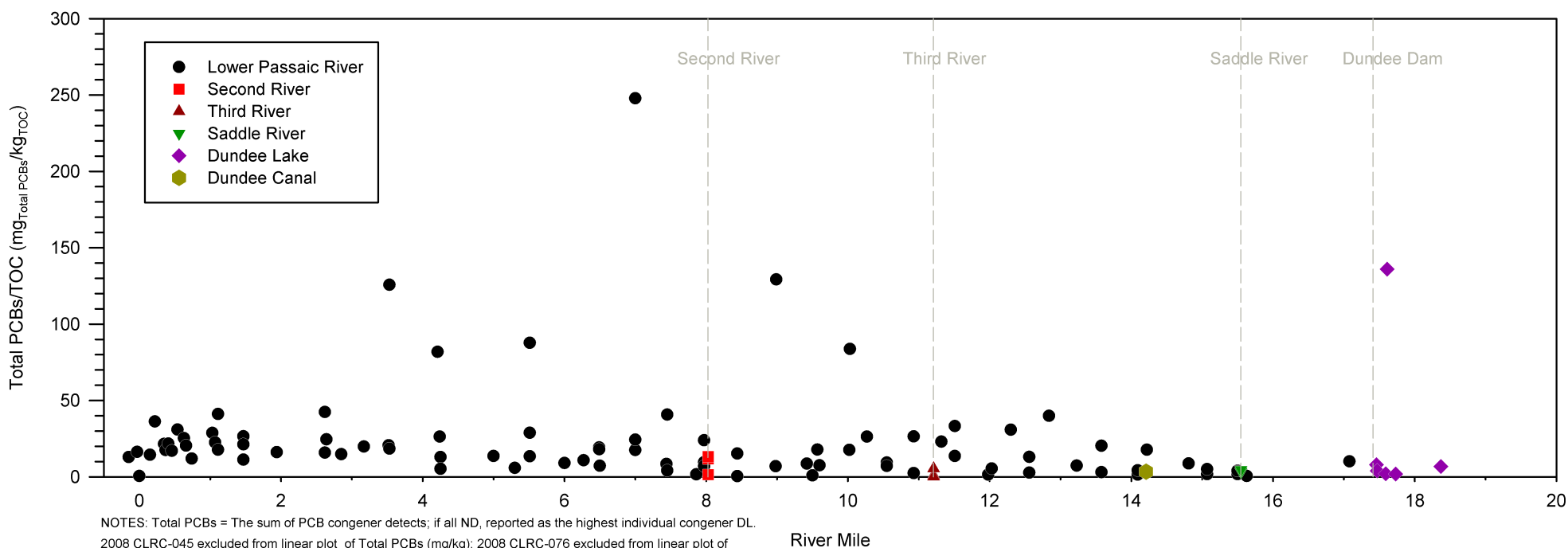
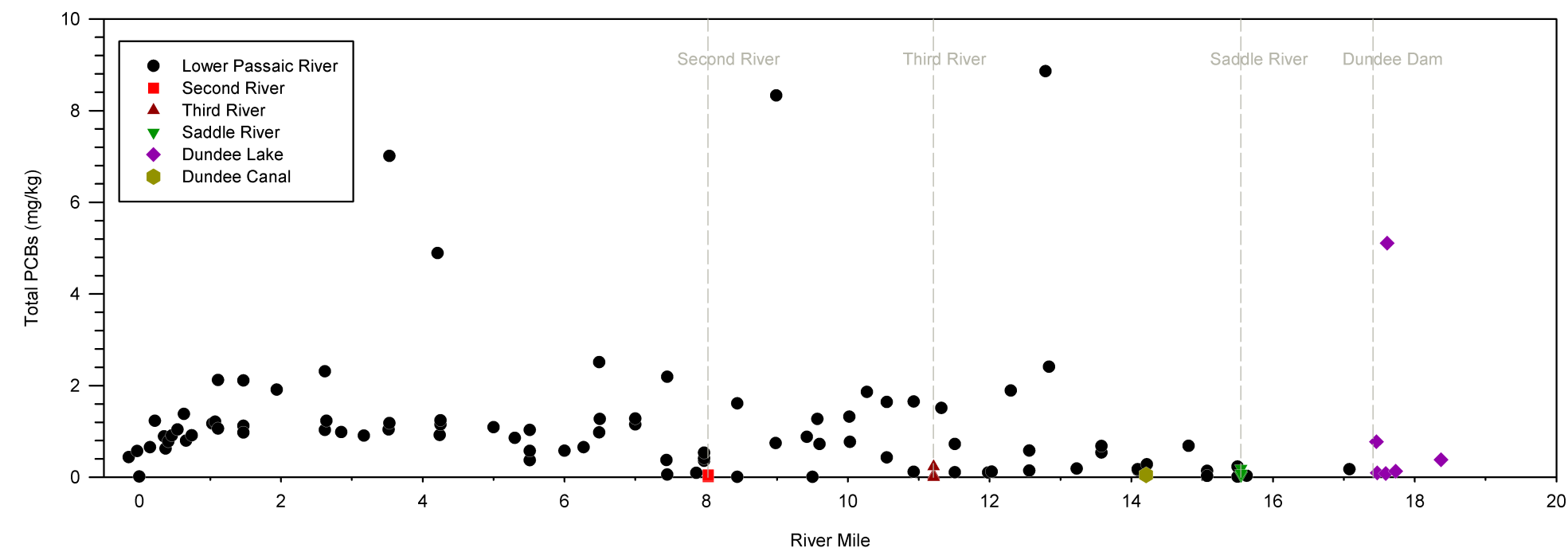
3-2.e Surficial Concentration vs. River Mile, Log Scale - Total PCBs
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



NOTES: Total PCBs = The sum of PCB congener detects; if all ND, reported as the highest individual congener DL. Circled sample 2008 CLRC-045 excluded from linear plot of Total PCBs (mg/kg)

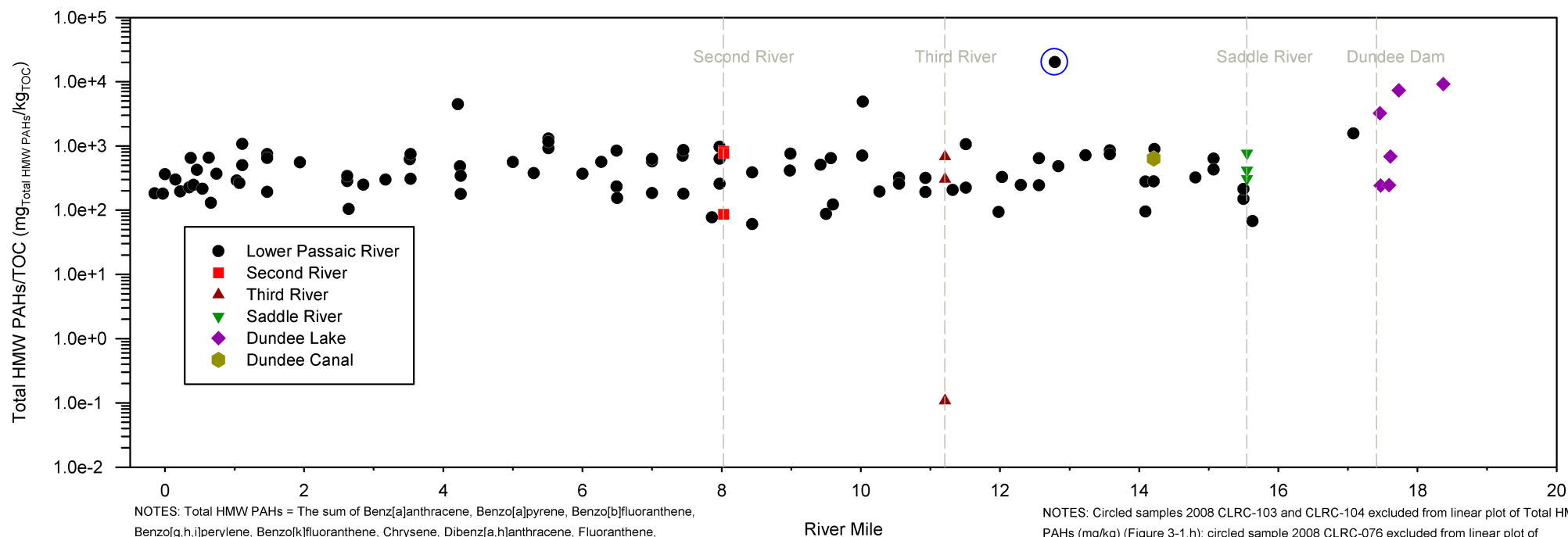
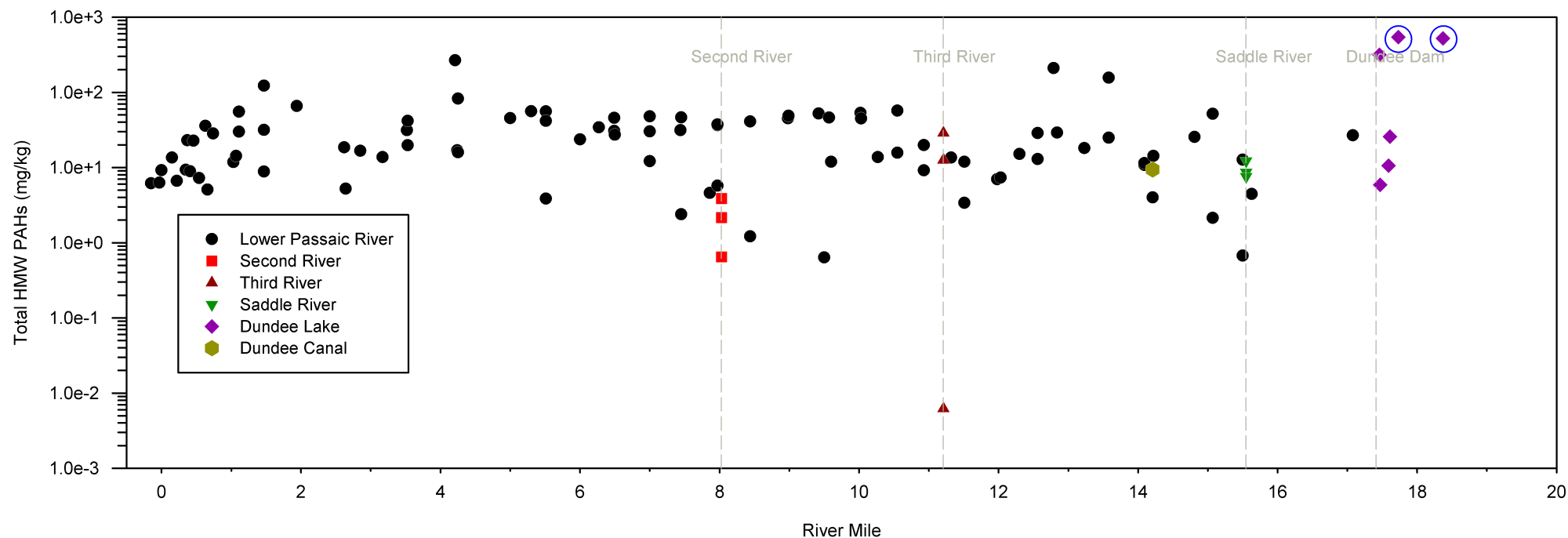
(Figure 3-1.f); circled sample 2008 CLRC-076, excluded from linear plot of Total PCBs/TOC (mg_{Total PCBs}/kg_{TOC}) (Figure 3-2.f).

3-2.f Surficial Concentration vs. River Mile, Linear Scale - Total PCBs
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



NOTES: Total PCBs = The sum of PCB congener detects; if all ND, reported as the highest individual congener DL.
2008 CLRC-045 excluded from linear plot of Total PCBs (mg/kg); 2008 CLRC-076 excluded from linear plot of
Total PCBs/TOC (mg_{TotalPCBs}/kg_{TOC}). Samples are circled on log plots (Figure 3-2.e).

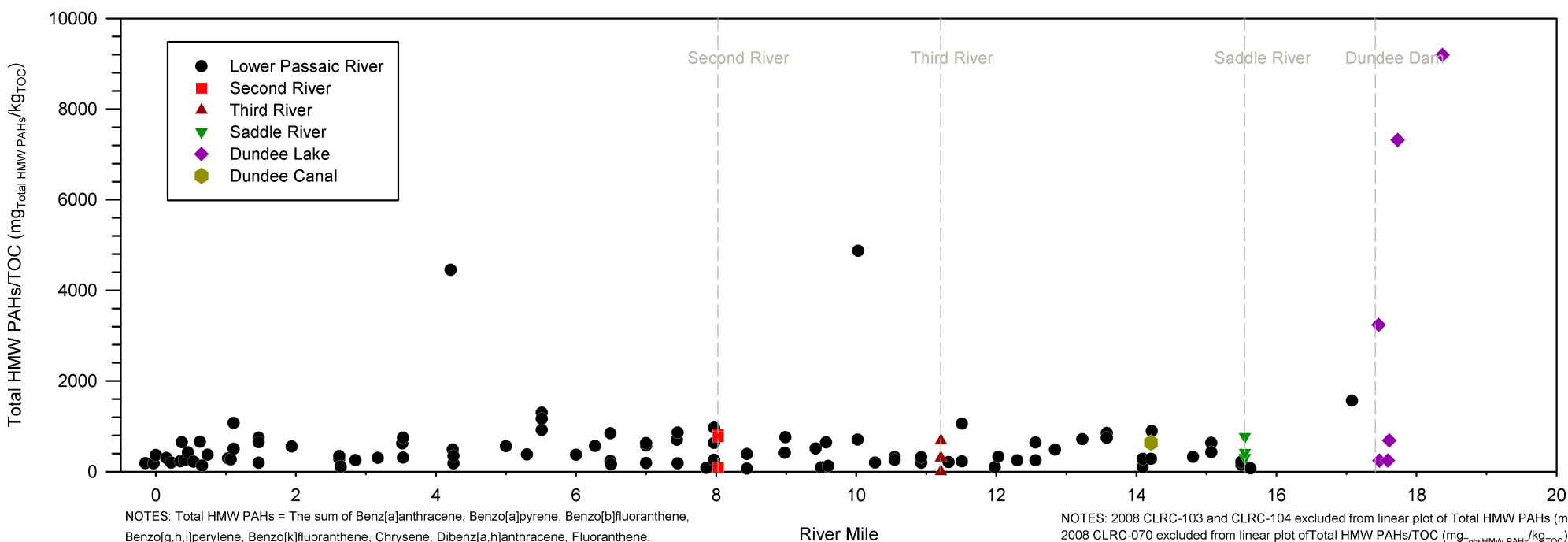
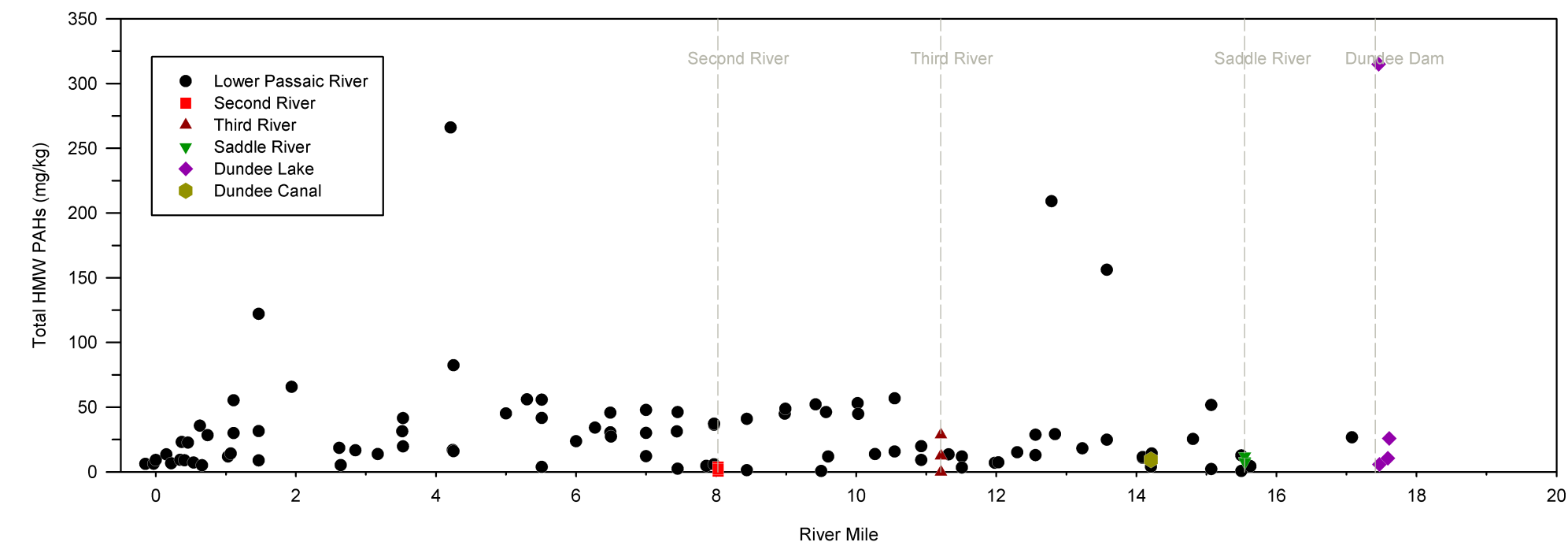
3-2.g Surficial Concentration vs. River Mile, Log Scale - Total HMW PAHs
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



NOTES: Total HMW PAHs = The sum of Benz[a]anthracene, Benzo[a]pyrene, Benzo[b]fluoranthene, Benzo[g,h,i]perylene, Benzo[k]fluoranthene, Chrysene, Dibenzo[a,h]anthracene, Fluoranthene, Indeno[1,2,3-cd]pyrene, and Pyrene detects; if all ND, reported as the highest individual analyte DL.

NOTES: Circled samples 2008 CLRC-103 and CLRC-104 excluded from linear plot of Total HMW PAHs (mg/kg) (Figure 3-1.h); circled sample 2008 CLRC-076 excluded from linear plot of Total HMW PAHs/TOC (mg_{Total HMW PAHs}/kg_{TOC}) (Figure 3-2.h).

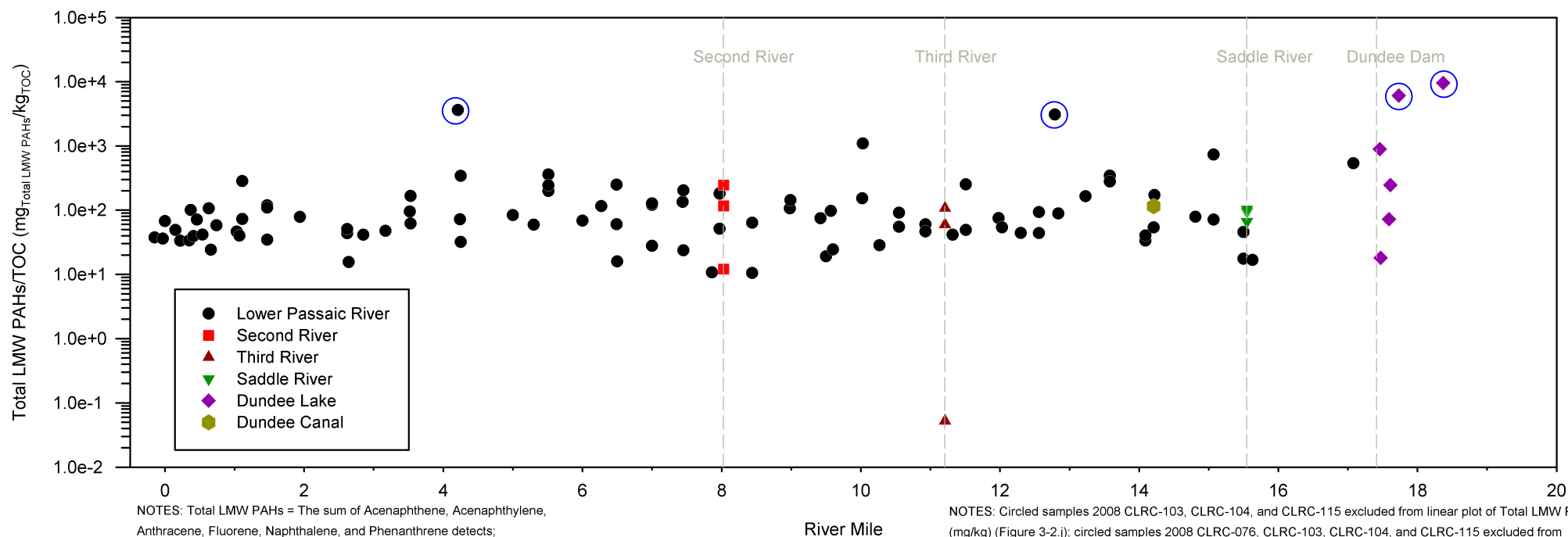
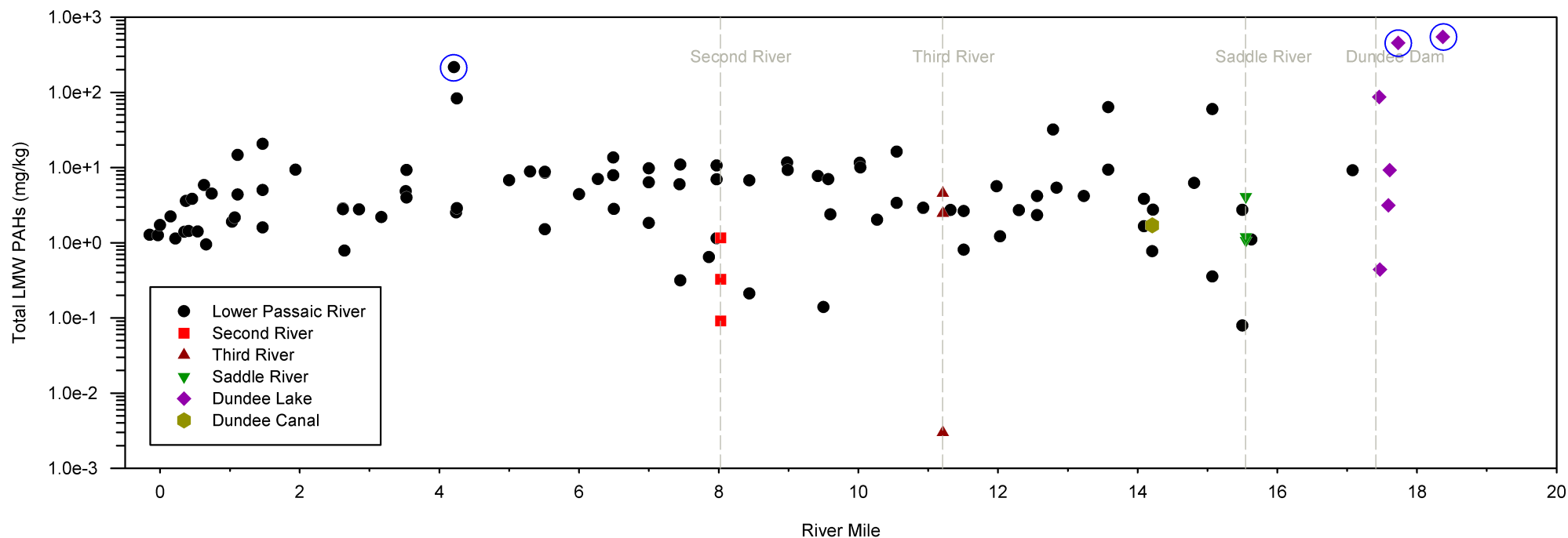
3-2.h Surficial Concentration vs. River Mile, Linear Scale - Total HMW PAHs
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



NOTES: Total HMW PAHs = The sum of Benz[a]anthracene, Benzo[a]pyrene, Benzo[b]fluoranthene, Benzo[g,h,i]perylene, Benzo[k]fluoranthene, Chrysene, Dibenzo[a,h]anthracene, Fluoranthene, Indeno[1,2,3-cd]pyrene, and Pyrene detects; if all ND, reported as the highest individual analyte DL.

NOTES: 2008 CLRC-103 and CLRC-104 excluded from linear plot of Total HMW PAHs (mg/kg); 2008 CLRC-070 excluded from linear plot of Total HMW PAHs/TOC ($\text{mg}_{\text{Total HMW PAHs}}/\text{kg}_{\text{TOC}}$). Samples are circled on log plots (Figure 3-2.g).

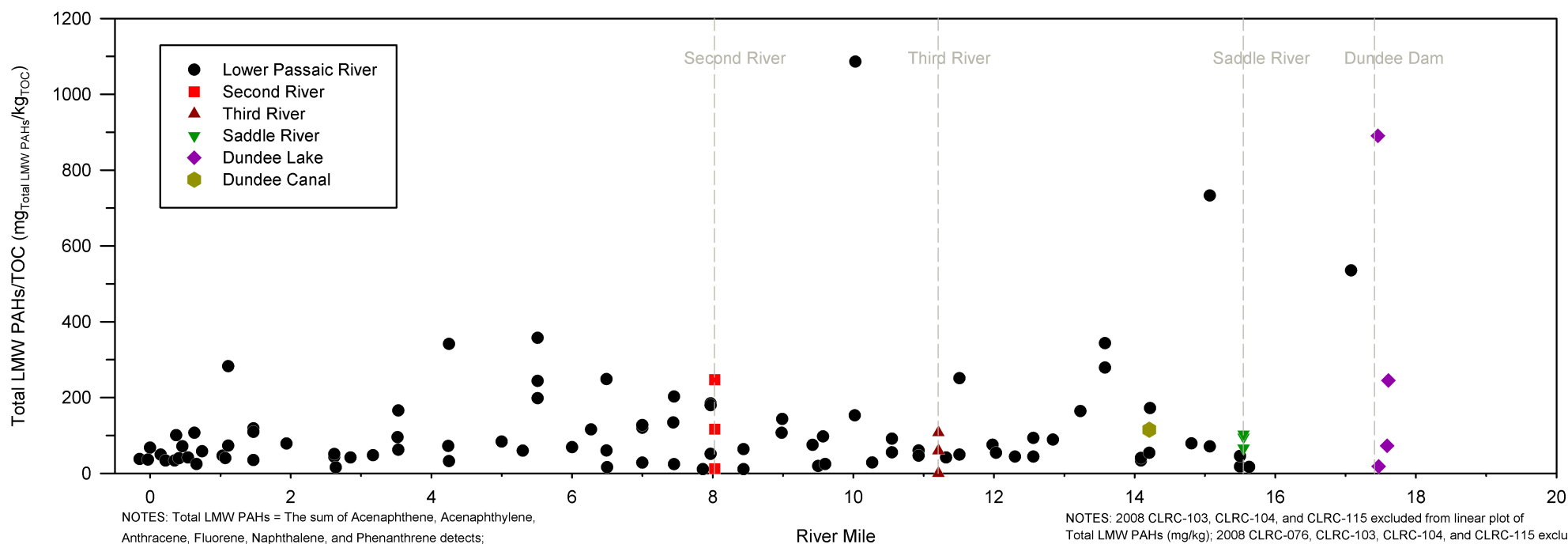
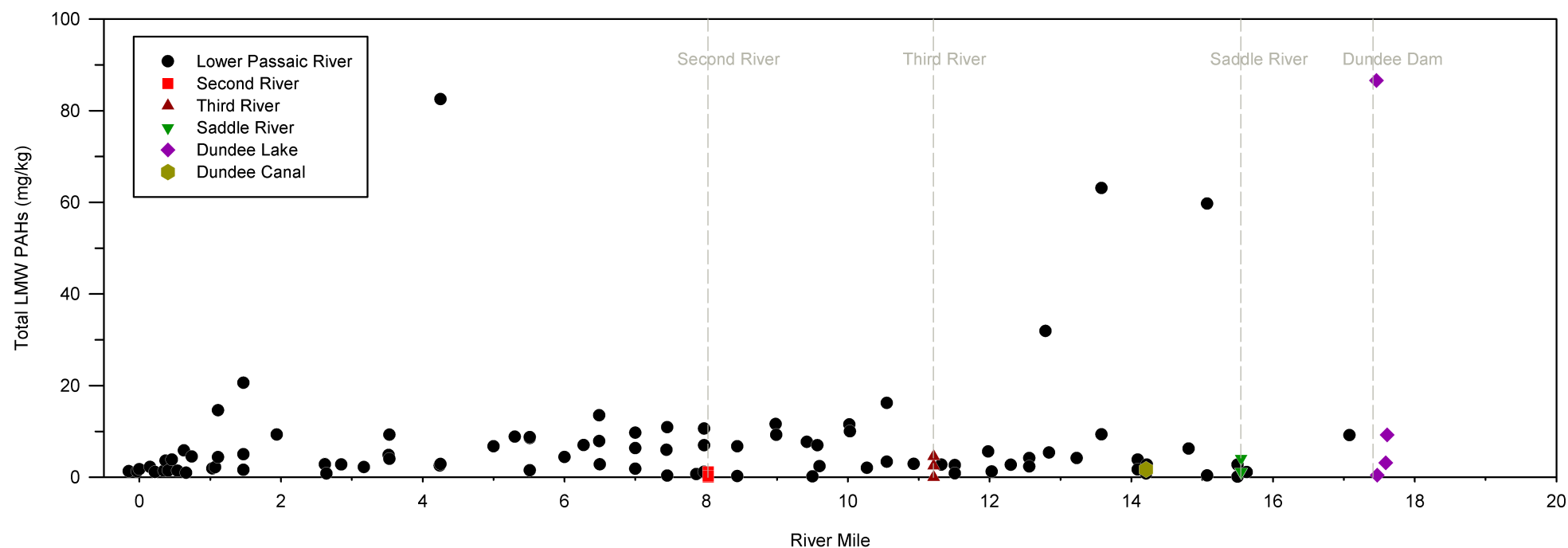
3-2.i Surficial Concentration vs. River Mile, Log Scale - Total LMW PAHs
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



NOTES: Total LMW PAHs = The sum of Acenaphthene, Acenaphthylene, Anthracene, Fluorene, Naphthalene, and Phenanthrene detects; if all ND, reported as the highest individual analyte DL.

NOTES: Circled samples 2008 CLRC-103, CLRC-104, and CLRC-115 excluded from linear plot of Total LMW PAHs (mg/kg) (Figure 3-2.j); circled samples 2008 CLRC-076, CLRC-103, CLRC-104, and CLRC-115 excluded from linear plot of Total LMW PAHs/TOC (mg_{Total LMW PAHs}/kg_{TOC}) (Figure 3-2.j).

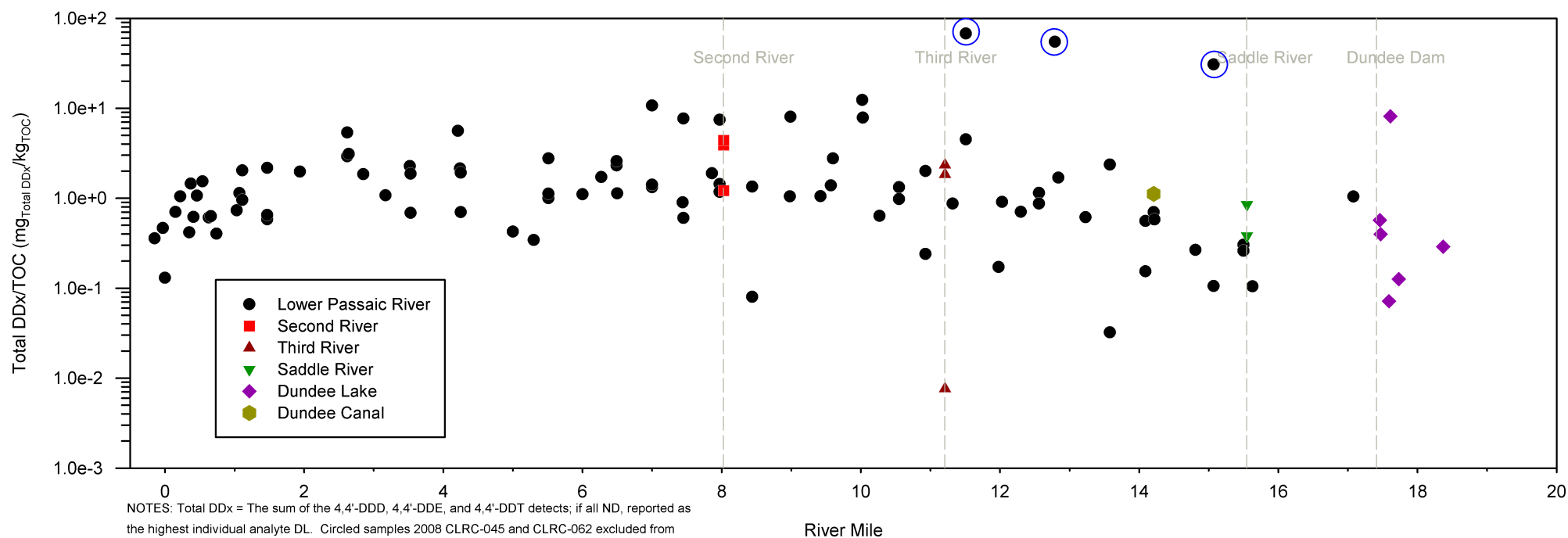
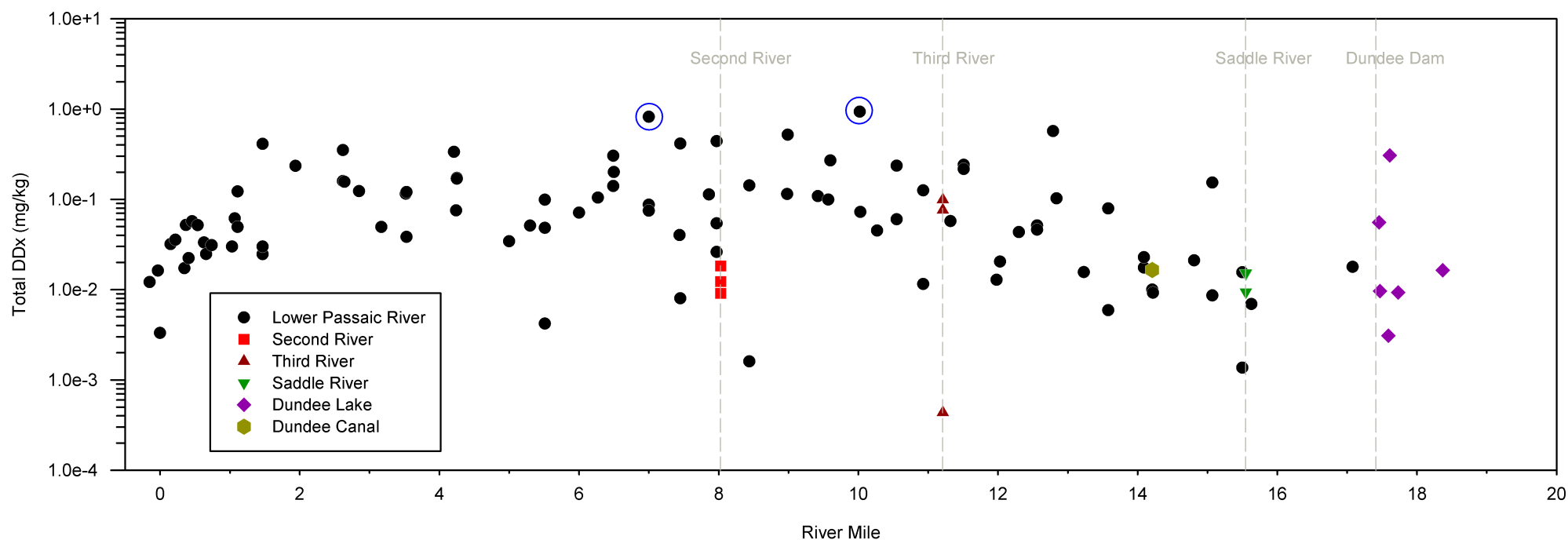
3-2.j Surficial Concentration vs. River Mile, Linear Scale - Total LMW PAHs
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



NOTES: Total LMW PAHs = The sum of Acenaphthene, Acenaphthylene, Anthracene, Fluorene, Naphthalene, and Phenanthrene detects; if all ND, reported as the highest individual analyte DL.

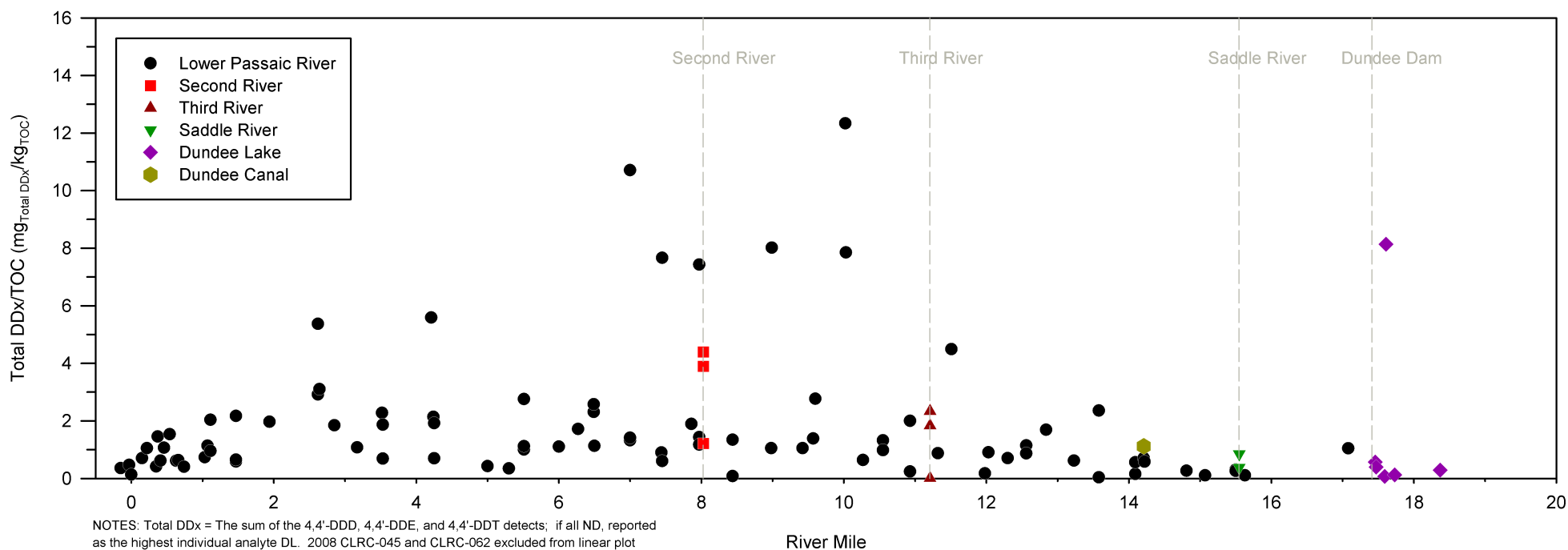
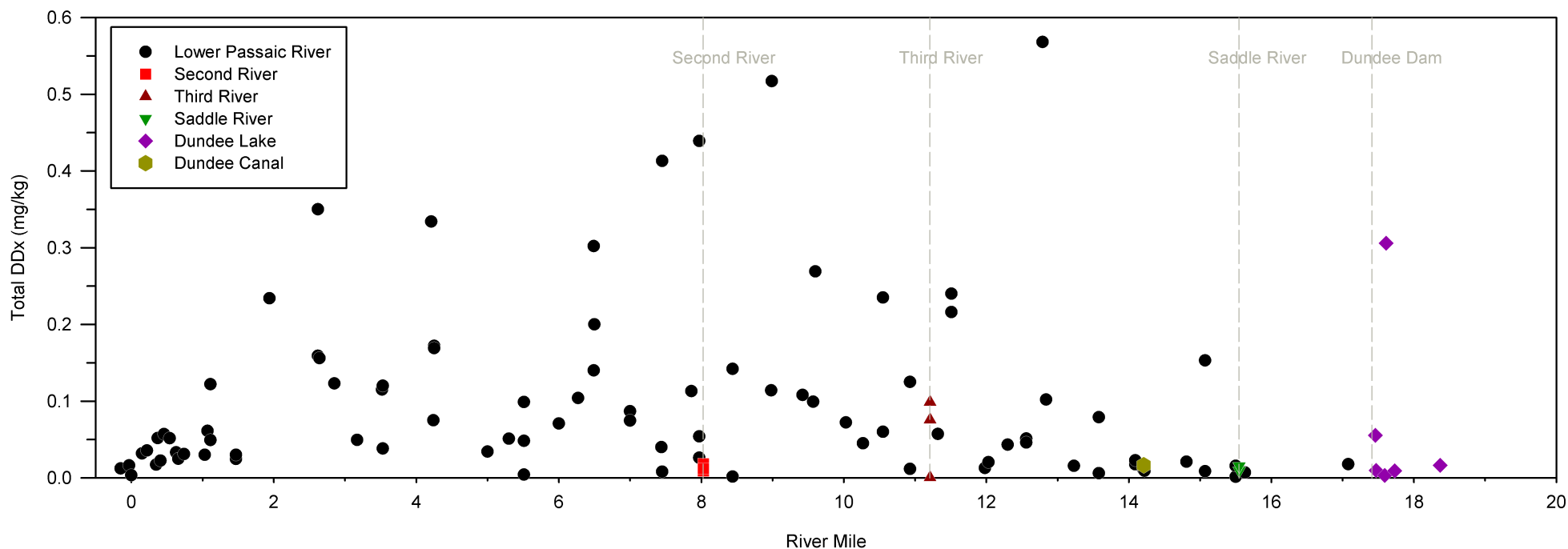
NOTES: 2008 CLRC-103, CLRC-104, and CLRC-115 excluded from linear plot of Total LMW PAHs (mg/kg); 2008 CLRC-076, CLRC-103, CLRC-104, and CLRC-115 excluded from linear plot of Total LMW PAHs/TOC (mg_{Total LMW PAHs}/kg_{TOC}). Samples are circled on log plots (Figure 3-2.i).

3-2.k Surficial Concentration vs. River Mile, Log Scale - Total DDx
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



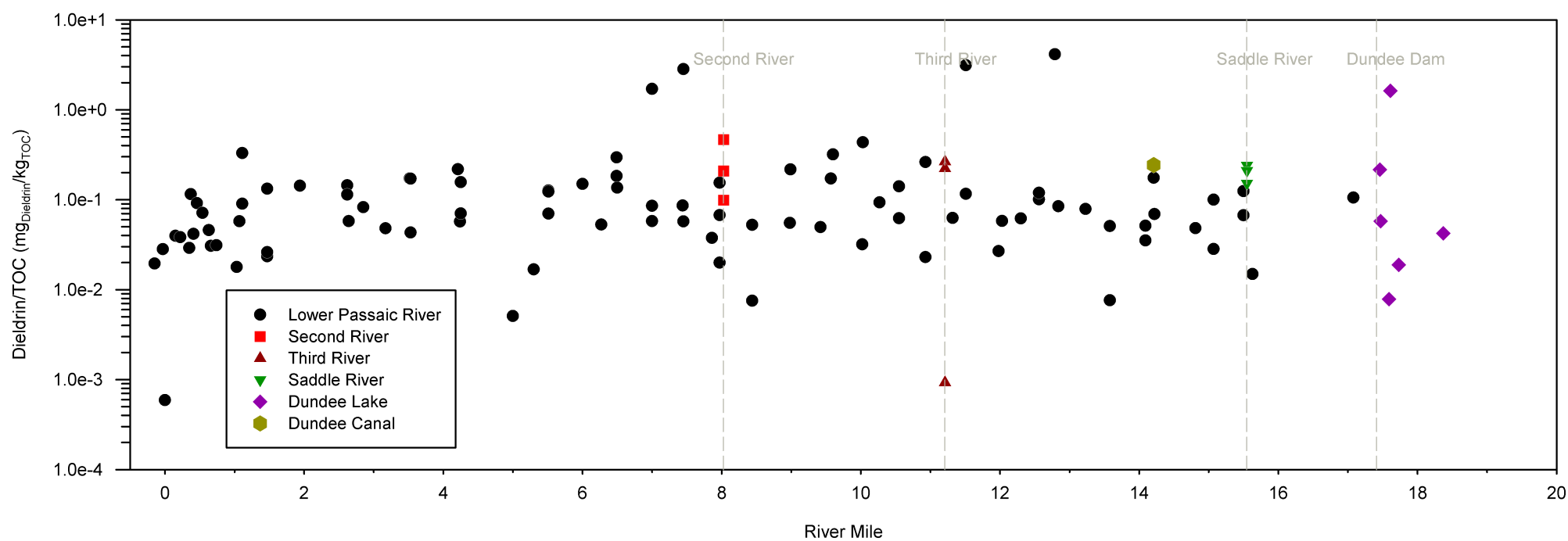
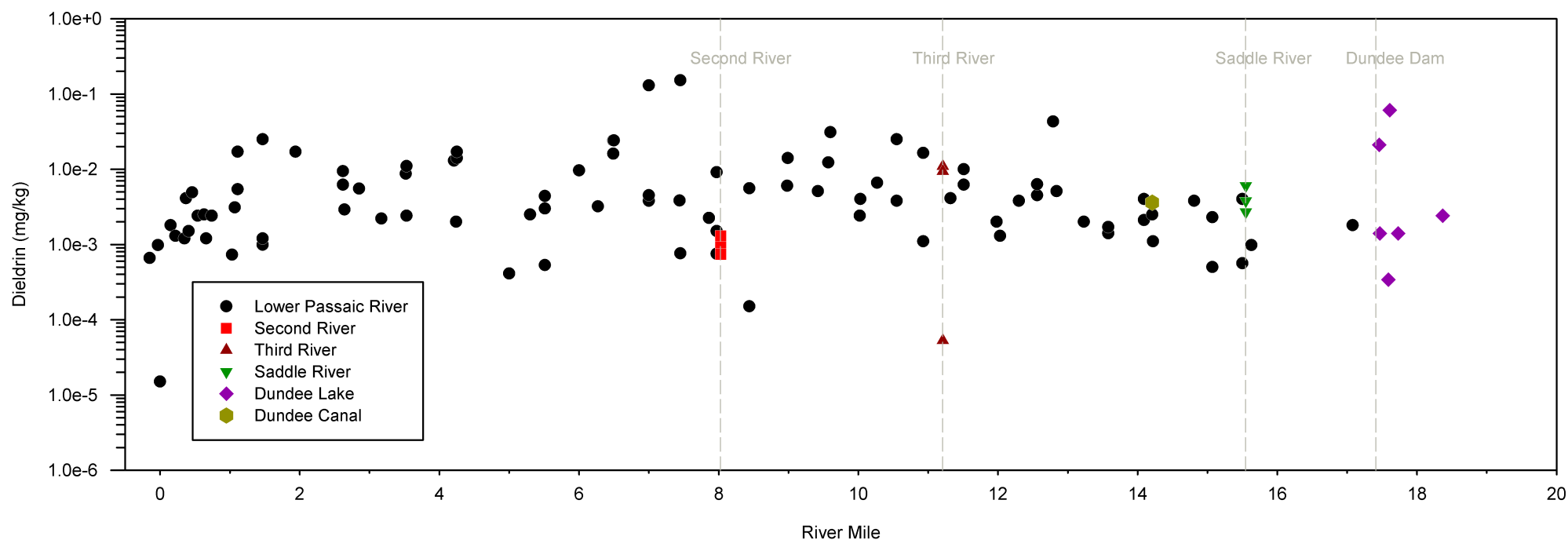
NOTES: Total DDx = The sum of the 4,4'-DDD, 4,4'-DDE, and 4,4'-DDT detects; if all ND, reported as the highest individual analyte DL. Circled samples 2008 CLRC-045 and CLRC-062 excluded from linear plot of Total DDx (mg/kg) (Figure 3-2.i); circled samples 2008 CLRC-070, CLRC-076 and CLRC-087 excluded from linear plot of Total DDx/TOC (mg_{TotalDDx}/kg_{TOC}) (Figure 3-2.i).

3-2.l Surficial Concentration vs. River Mile, Linear Scale - Total DDx
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only

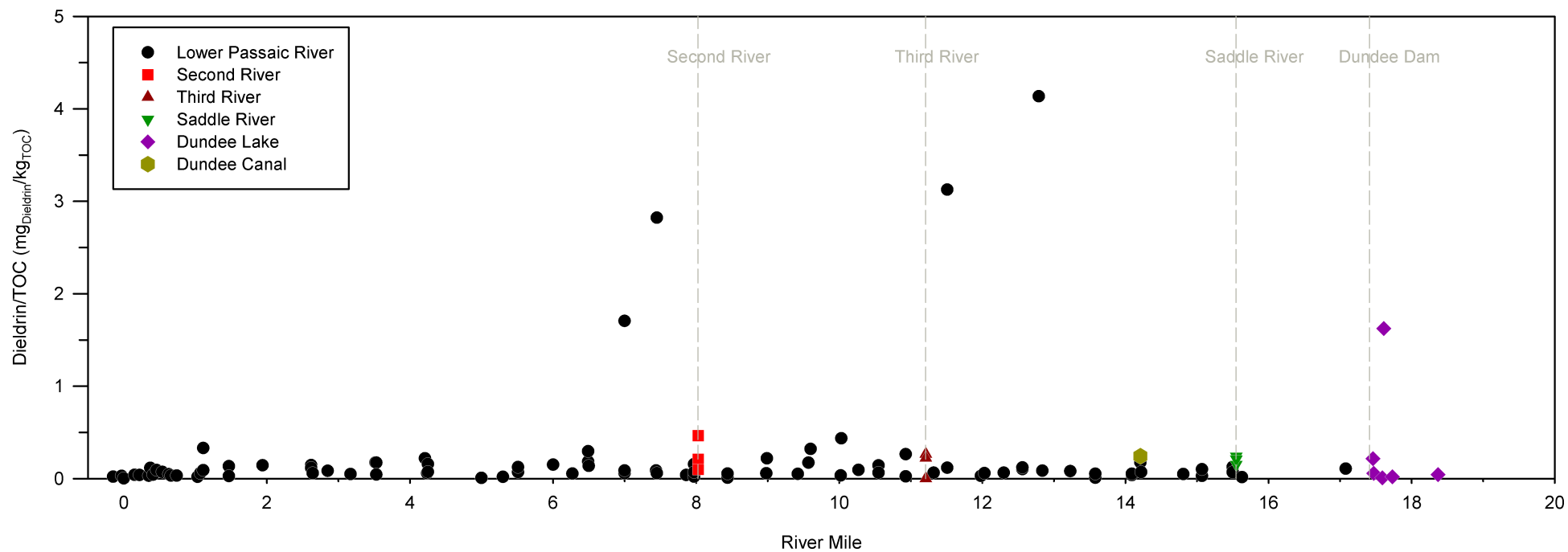
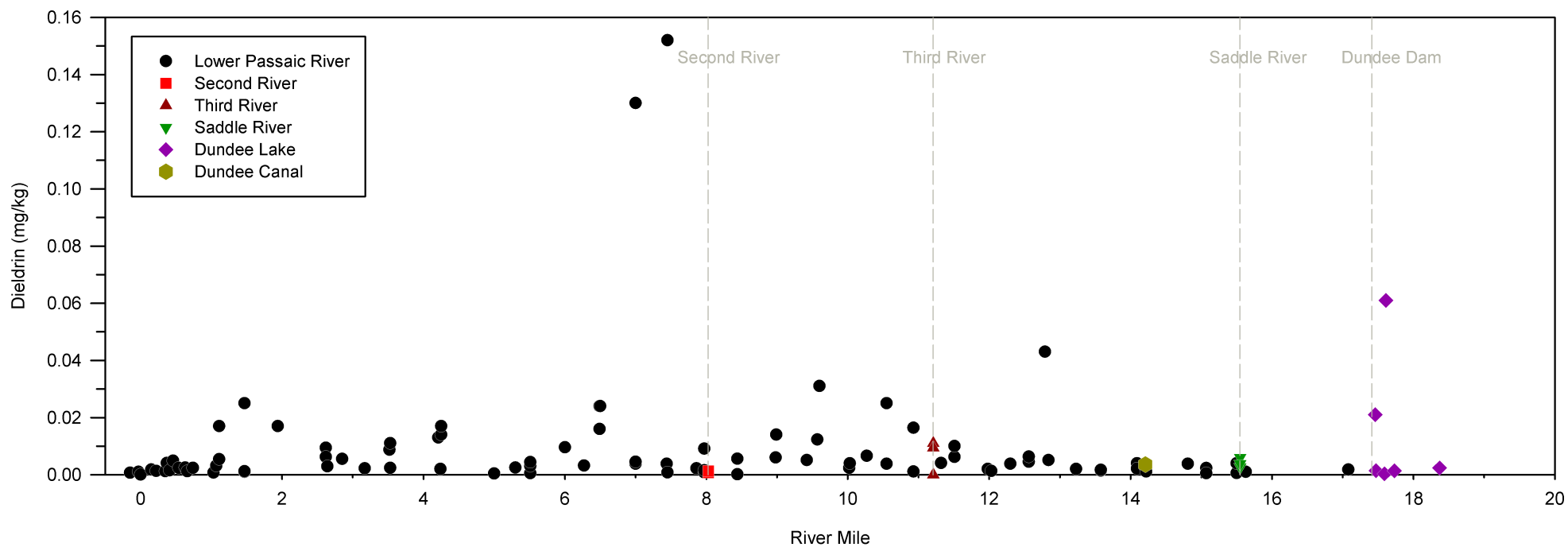


NOTES: Total DDx = The sum of the 4,4'-DDD, 4,4'-DDE, and 4,4'-DDT detects; if all ND, reported as the highest individual analyte DL. 2008 CLRC-045 and CLRC-062 excluded from linear plot of Total DDx (mg/kg); 2008 CLRC-070, CLRC-076 and CLRC-087 excluded from linear plot of Total DDx/TOC (mg_{TotalDDx}/kg_{TOC}). Samples are circled on log plots (Figure 3-2.k).

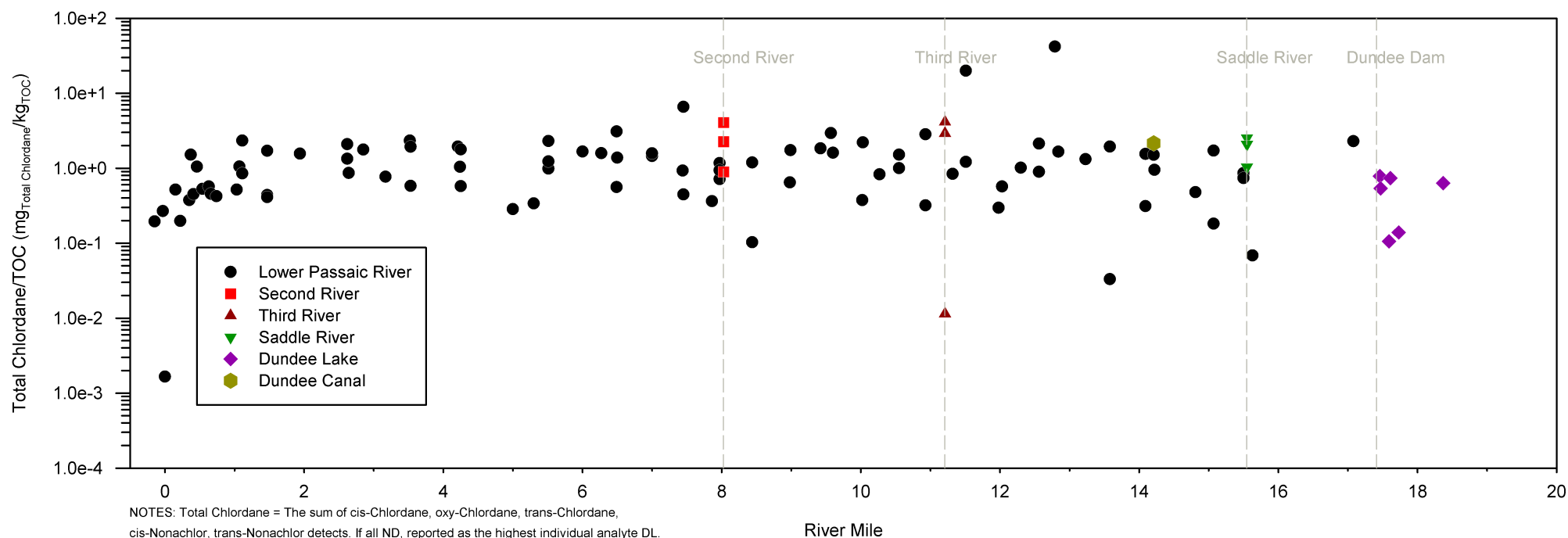
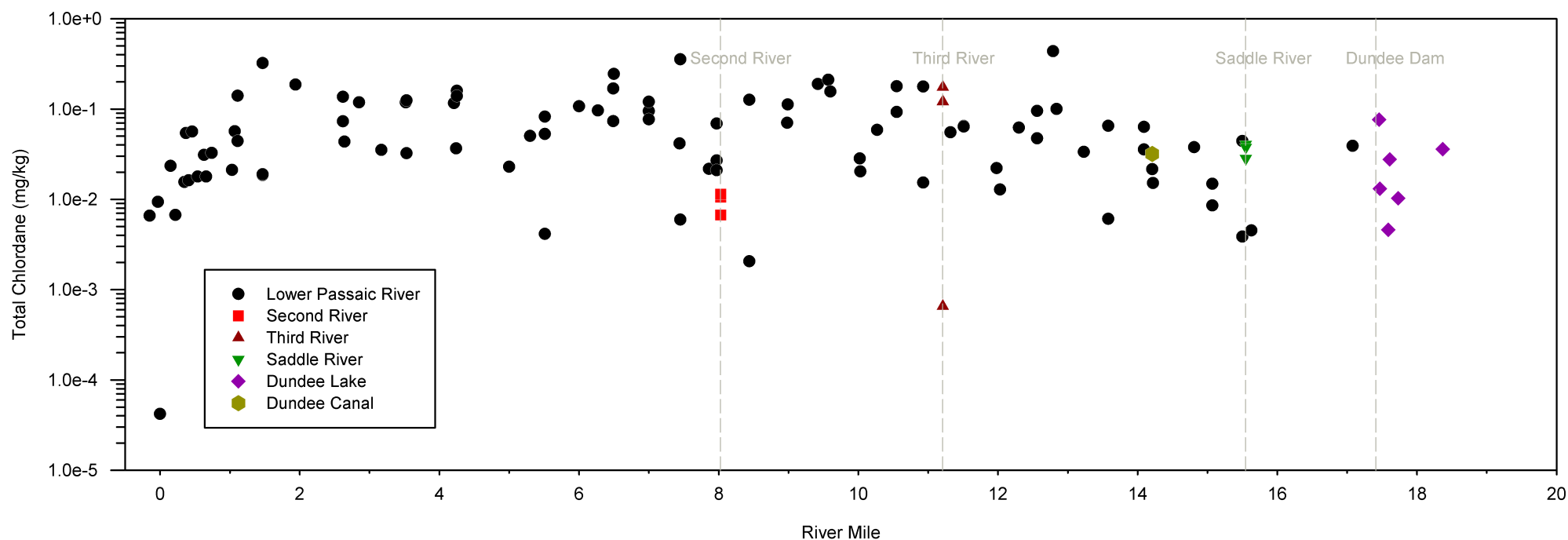
3-2.m Surficial Concentration vs. River Mile, Log Scale - Dieldrin
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



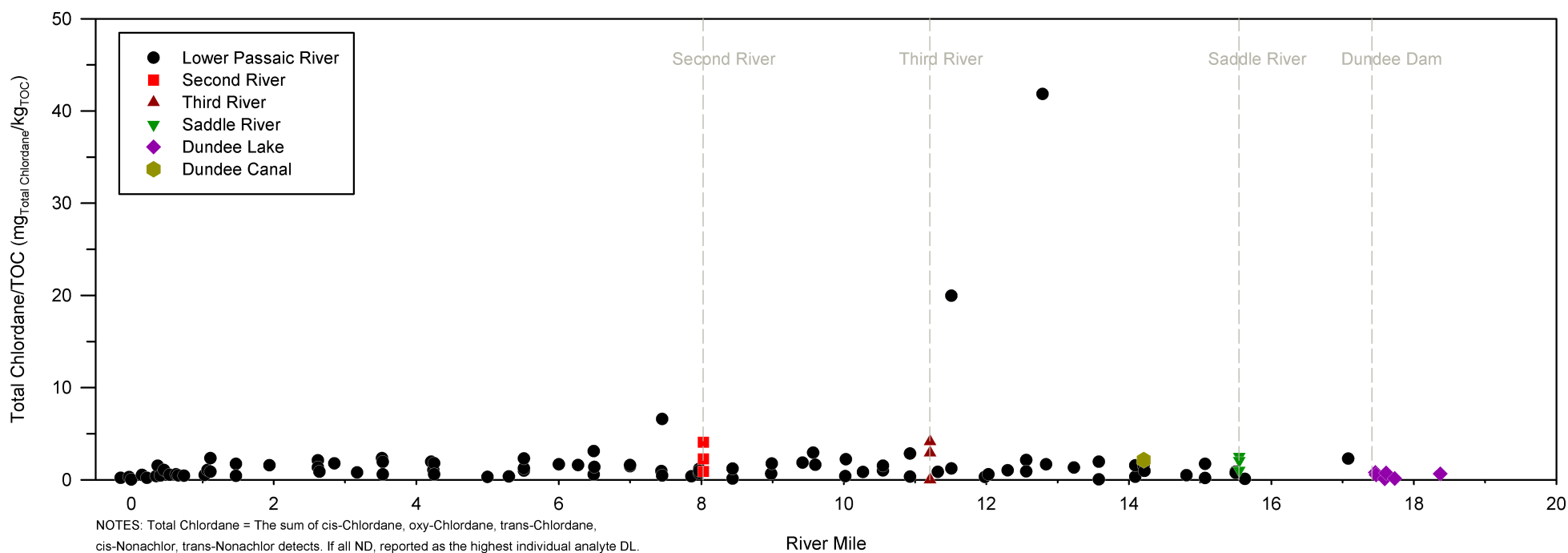
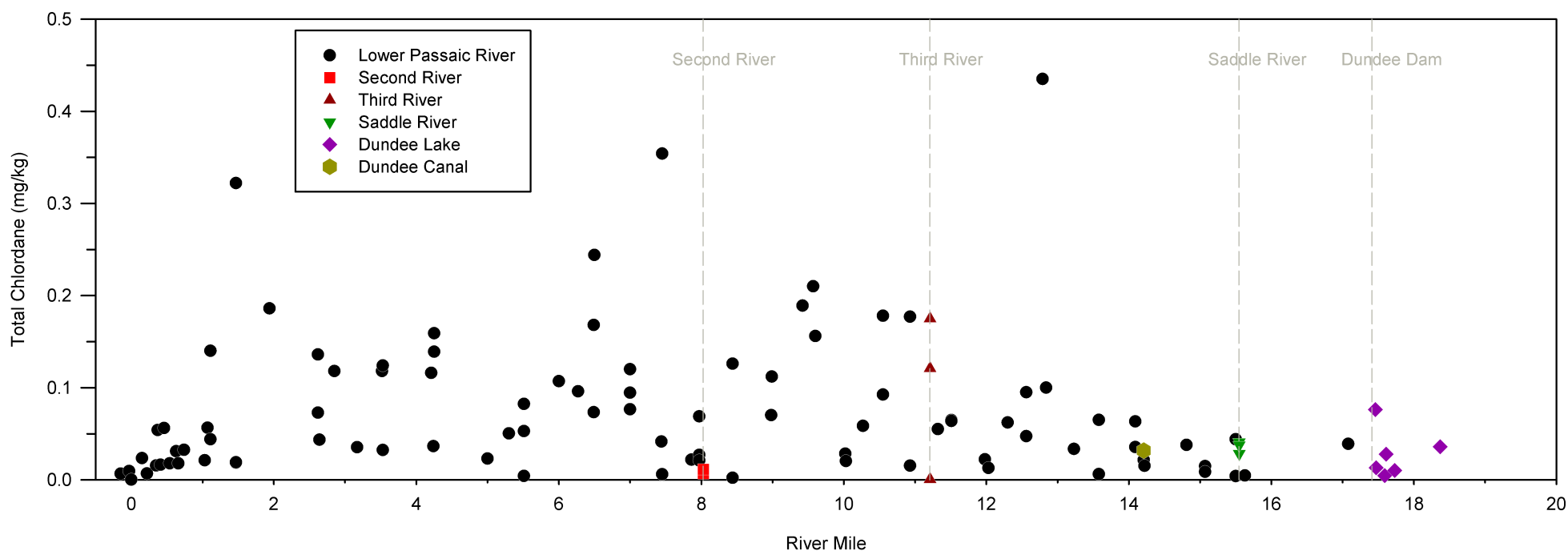
3-2.n Surficial Concentration vs. River Mile, Linear Scale - Dieldrin
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



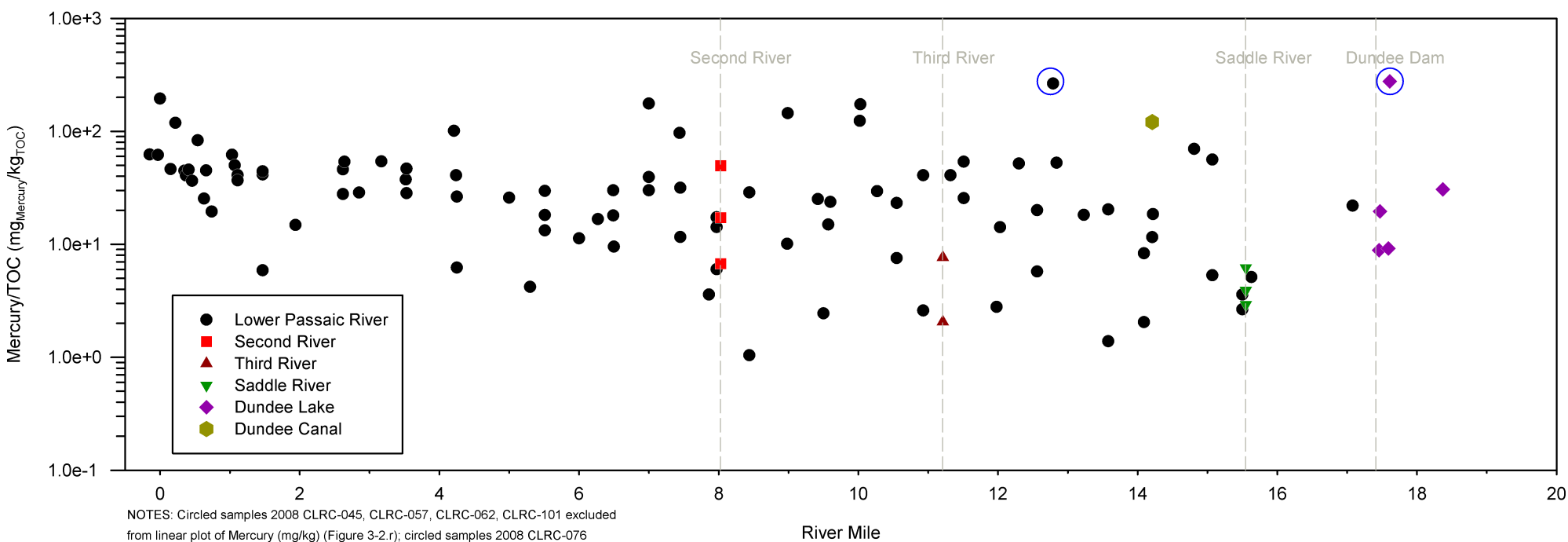
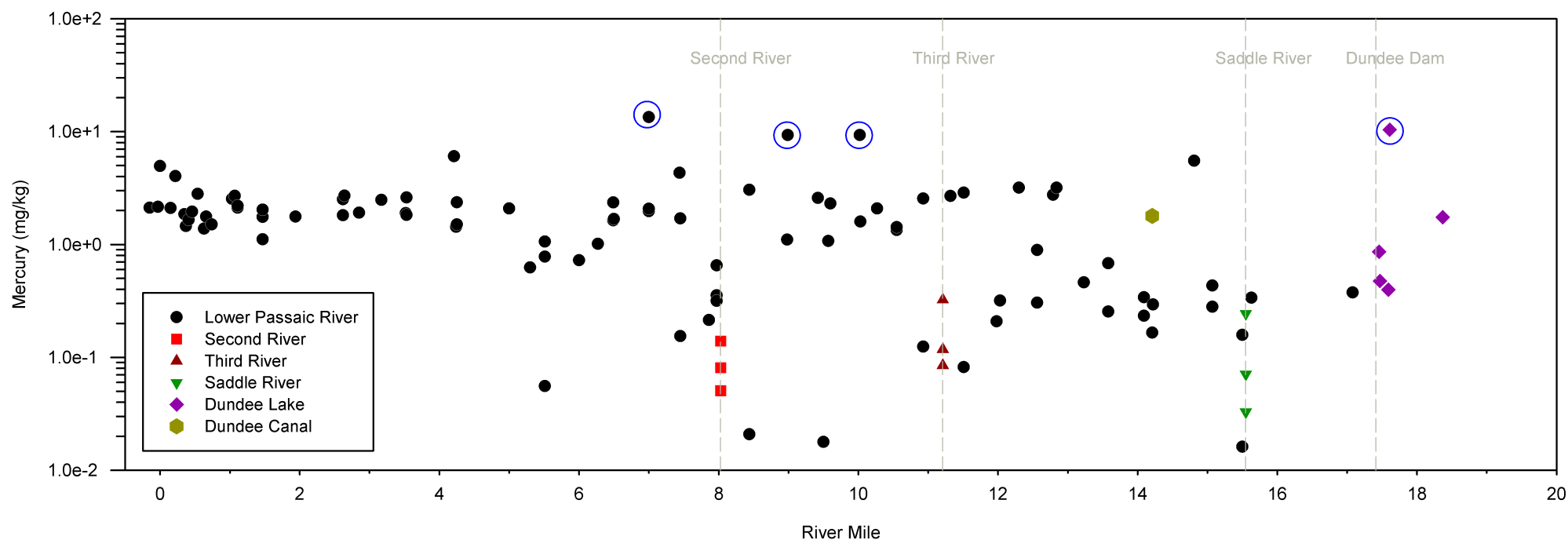
3-2.o Surficial Concentration vs. River Mile, Log Scale - Total Chlordane Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



3-2.p Surficial Concentration vs. River Mile, Linear Scale - Total Chlordane
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only

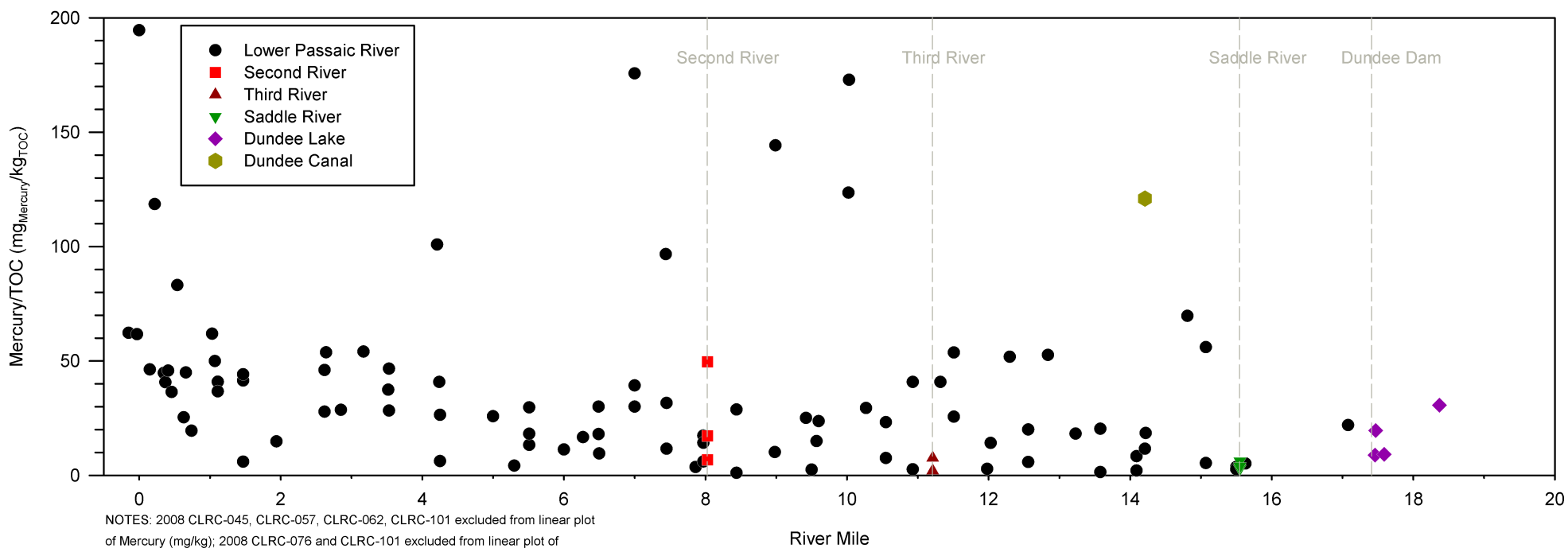
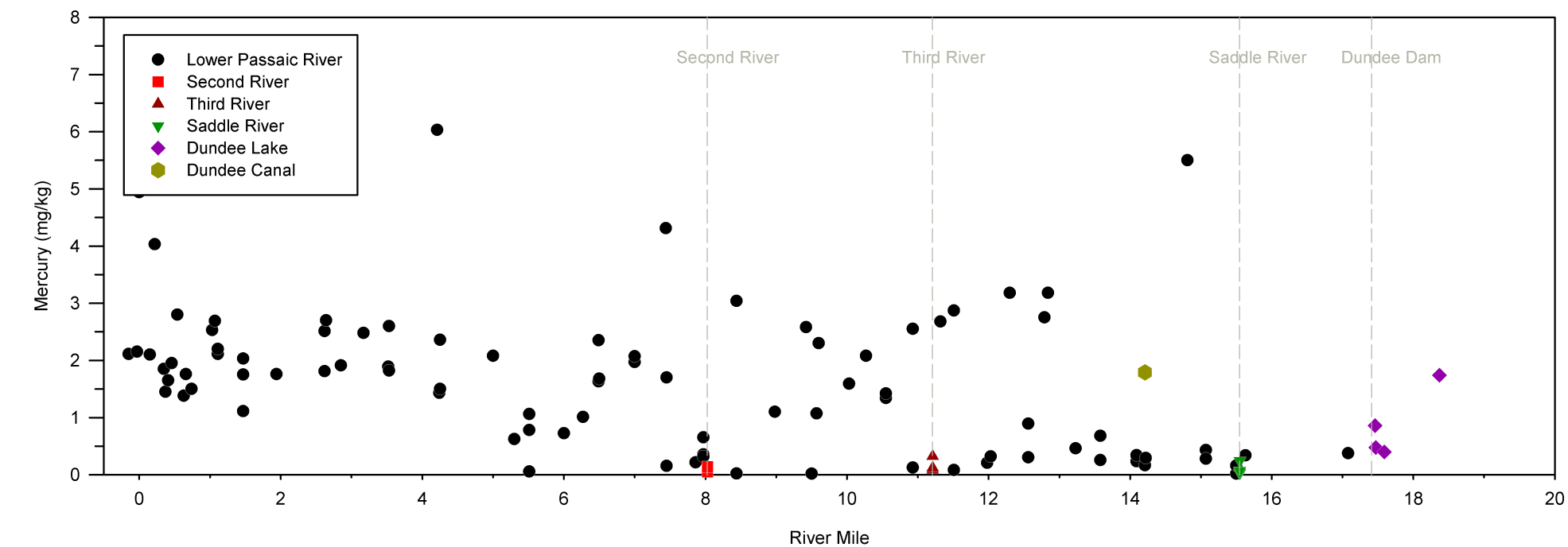


3-2.q Surficial Concentration vs. River Mile, Log Scale - Mercury
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



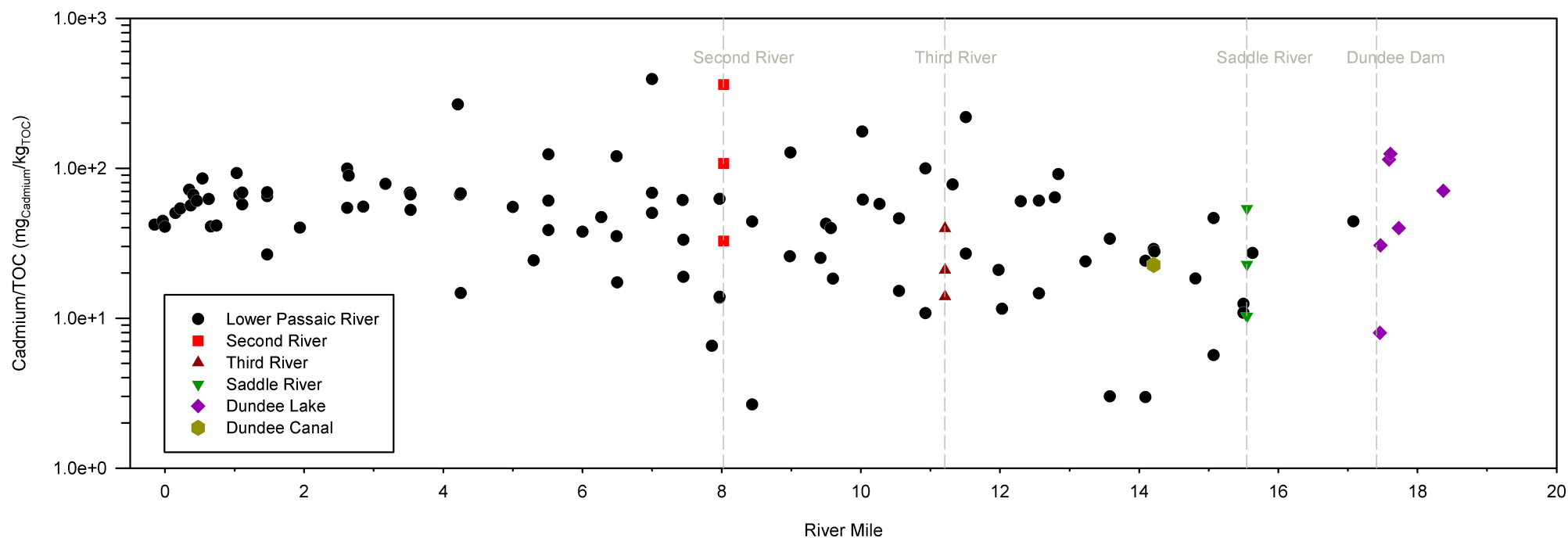
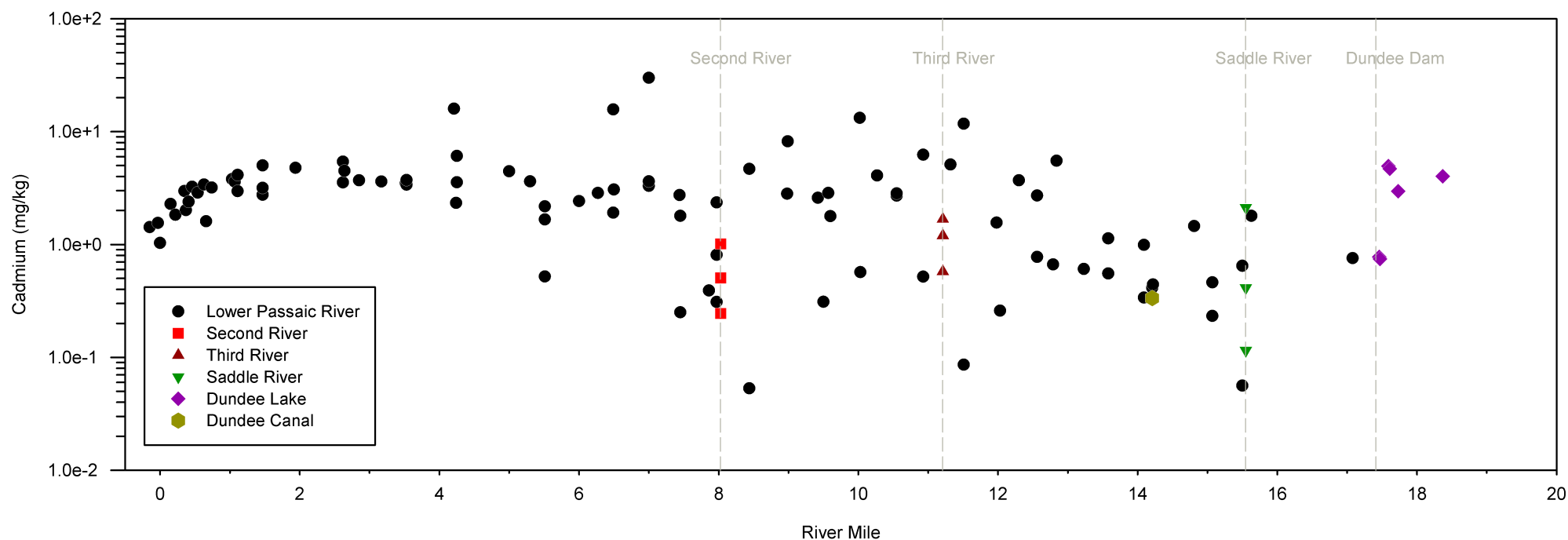
NOTES: Circled samples 2008 CLRC-045, CLRC-057, CLRC-062, CLRC-101 excluded from linear plot of Mercury (mg/kg) (Figure 3-2.r); circled samples 2008 CLRC-076 and CLRC-101 excluded from linear plot of Mercury/TOC ($\text{mg}_{\text{Mercury}}/\text{kg}_{\text{TOC}}$) (Figure 3-2.r).

3-2.r Surficial Concentration vs. River Mile, Linear Scale - Mercury
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only

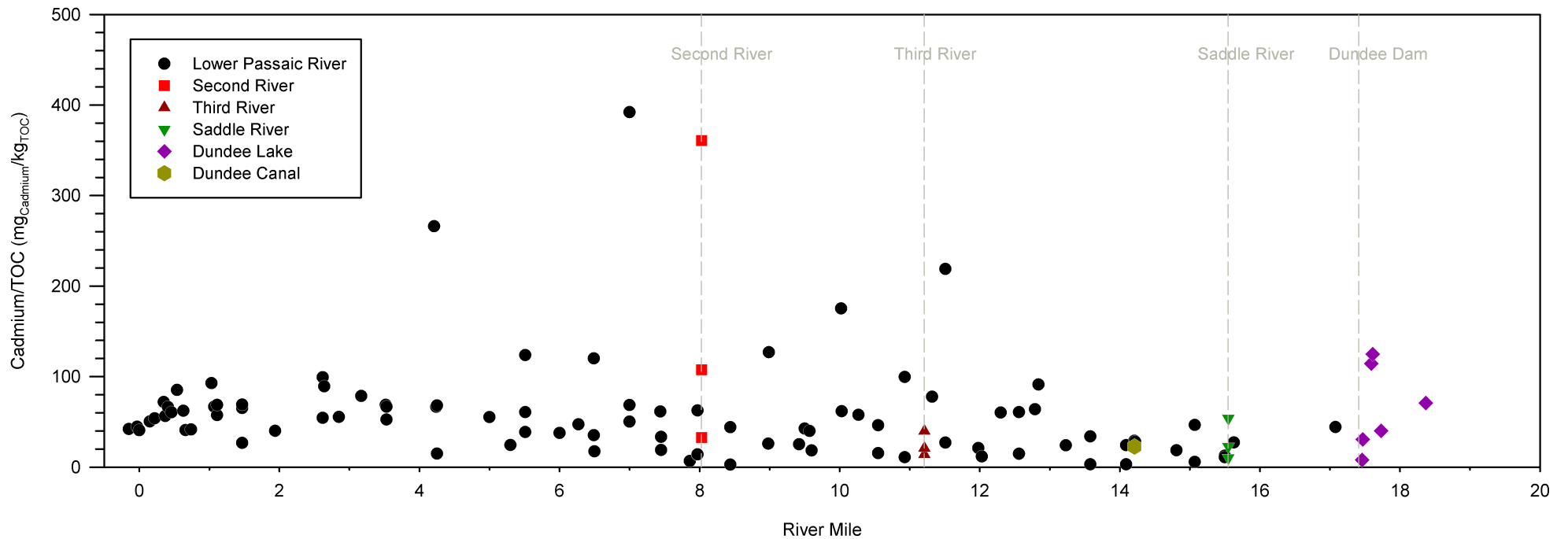
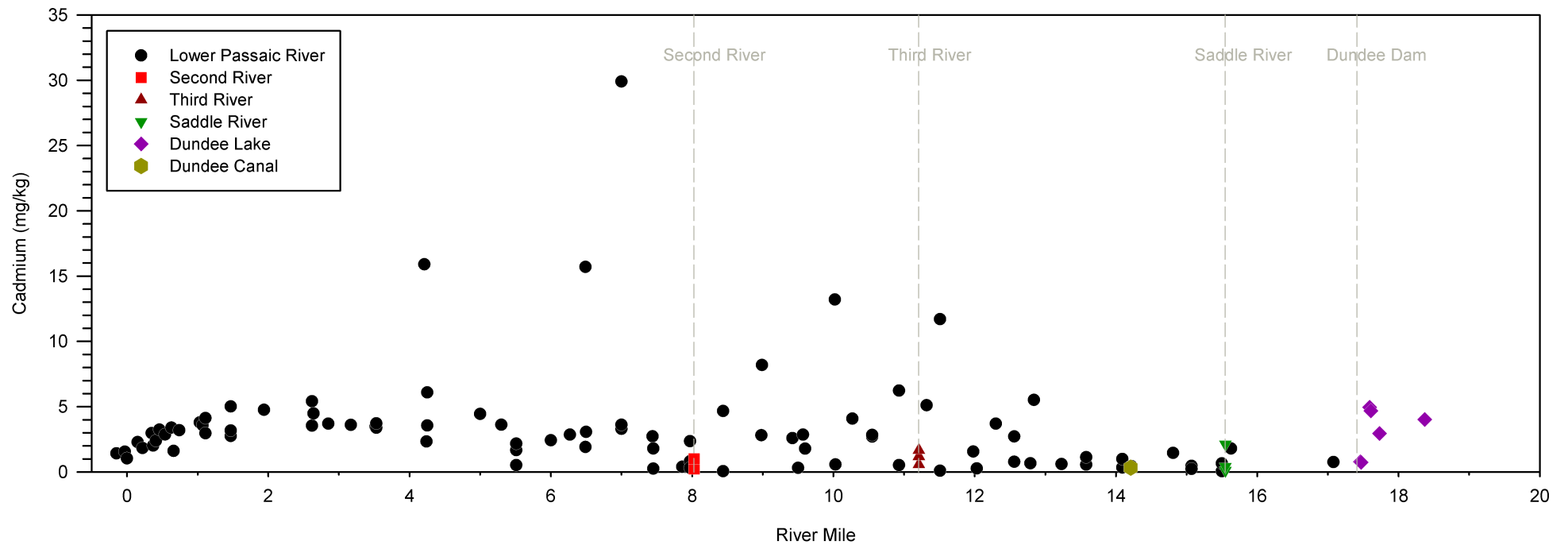


NOTES: 2008 CLRC-045, CLRC-057, CLRC-062, CLRC-101 excluded from linear plot of Mercury (mg/kg); 2008 CLRC-076 and CLRC-101 excluded from linear plot of Mercury/TOC ($\text{mg}_{\text{Mercury}}/\text{kg}_{\text{TOC}}$). Samples are circled on log plots (Figure 3-2.q).

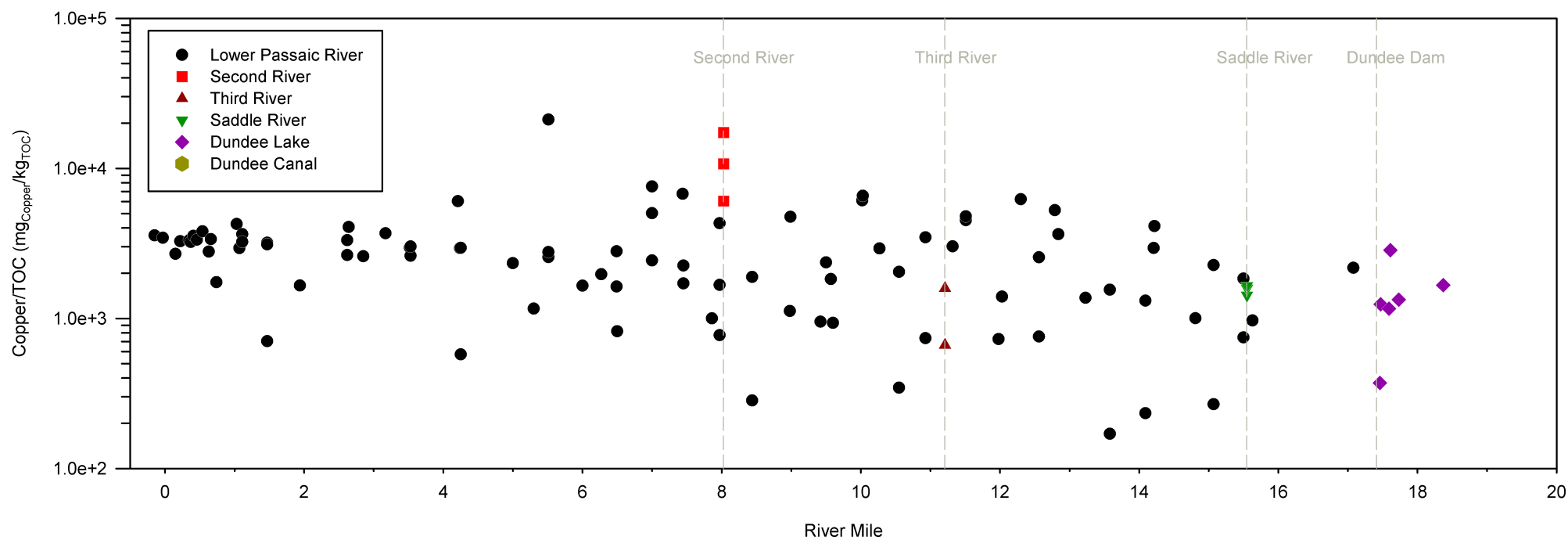
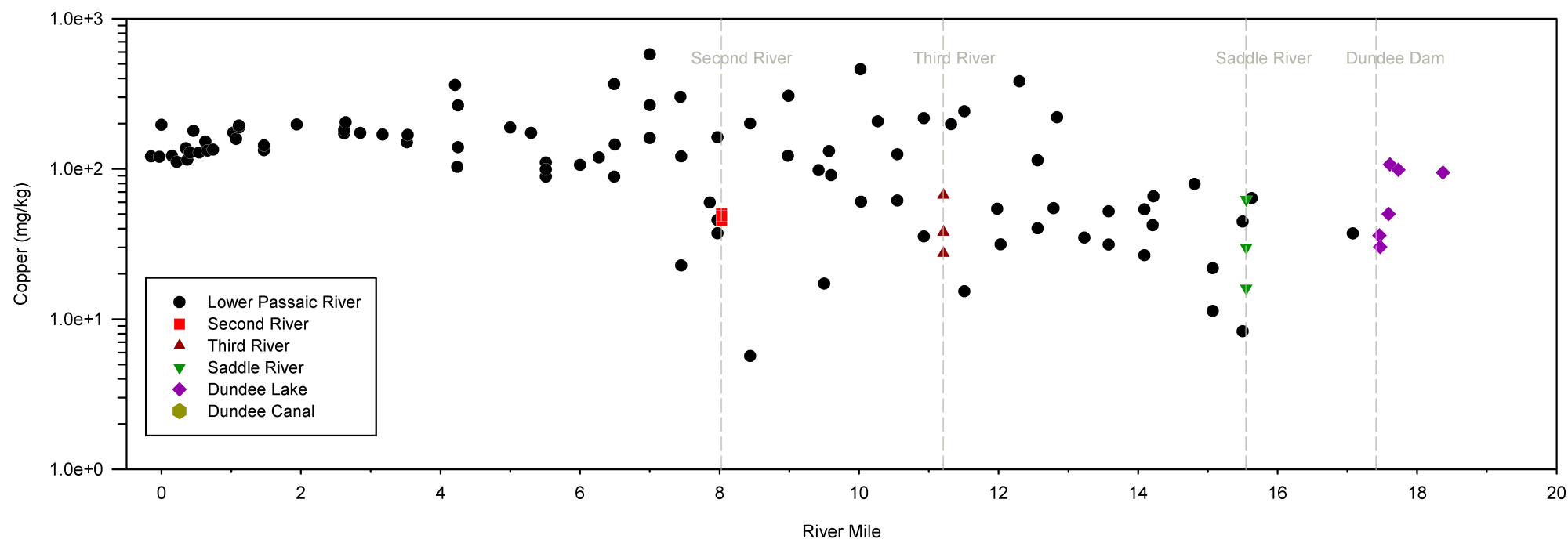
3-2.s Surficial Concentration vs. River Mile, Log Scale - Cadmium
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



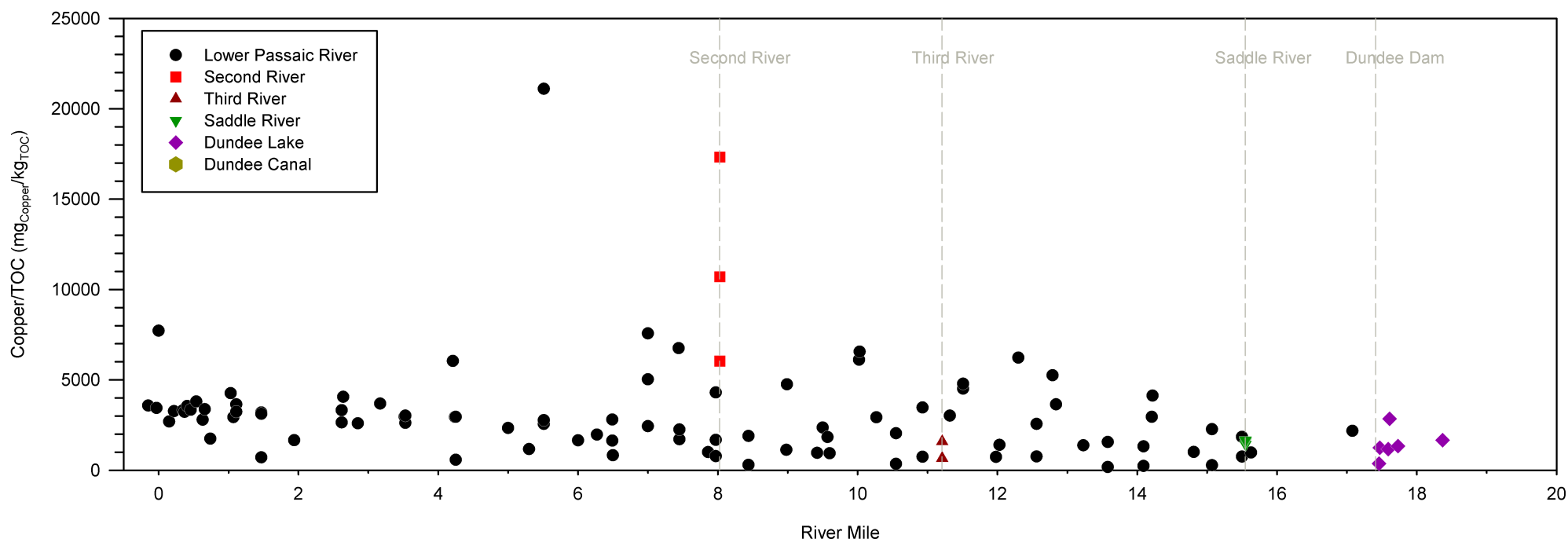
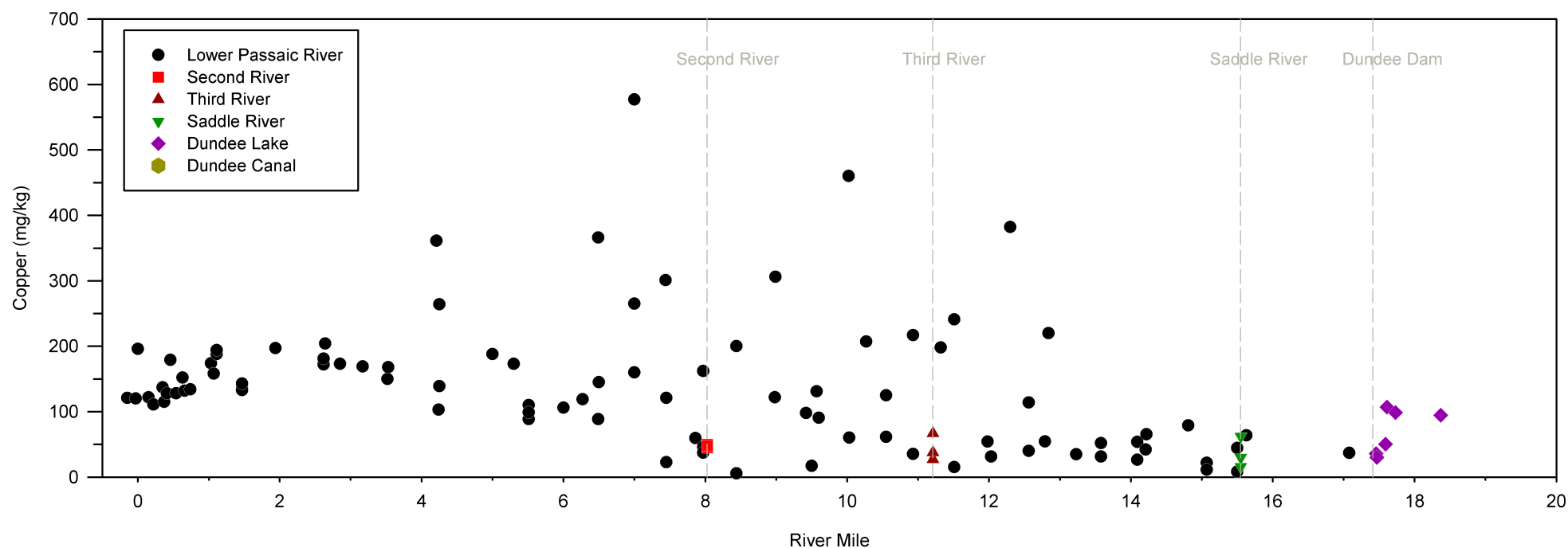
3-2.t Surficial Concentration vs. River Mile, Linear Scale - Cadmium
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



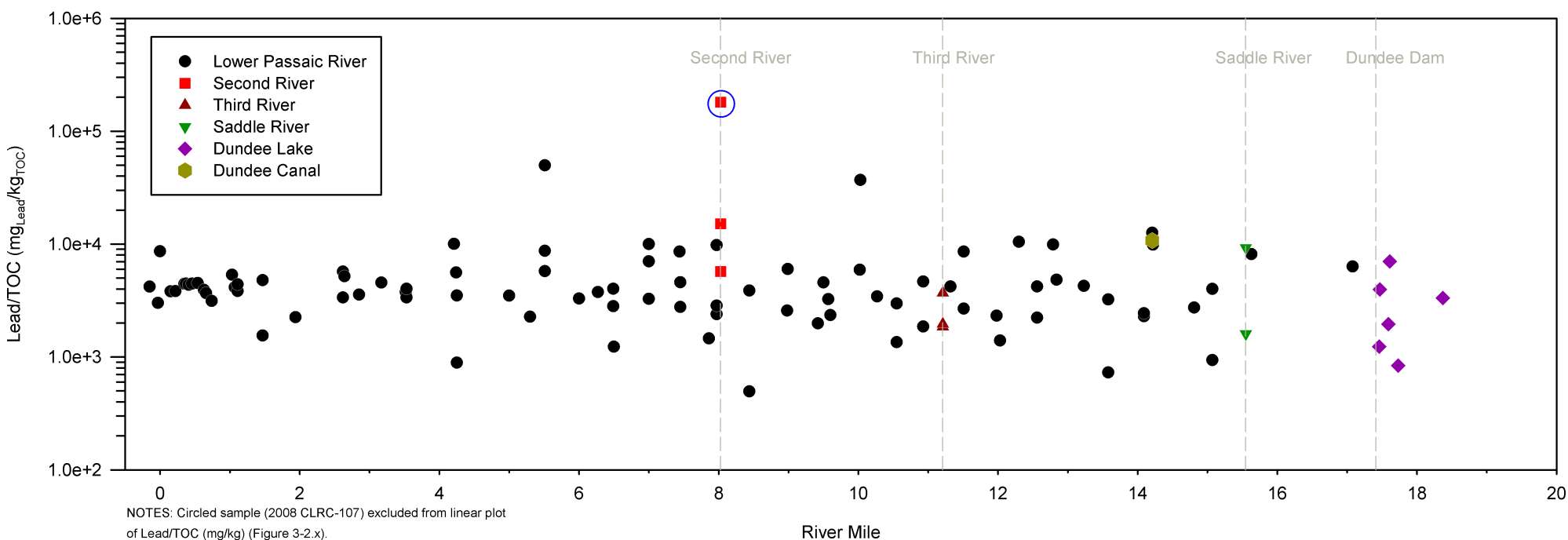
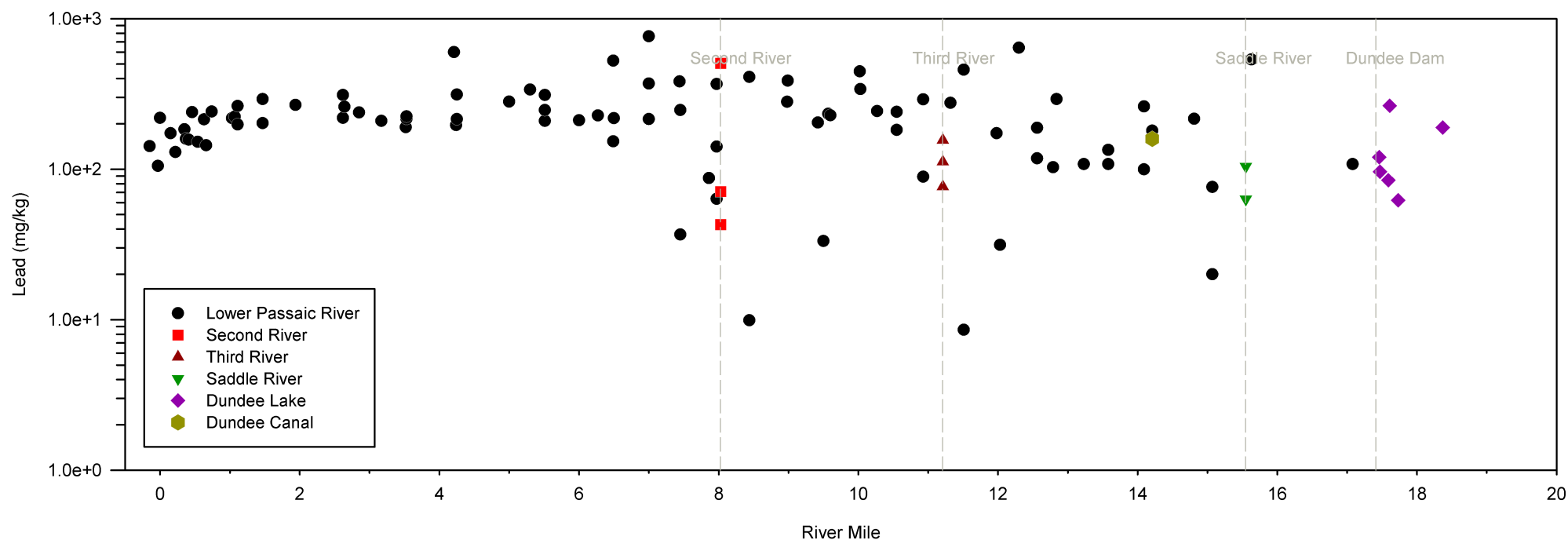
3-2.u Surficial Concentration vs. River Mile, Log Scale - Copper
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



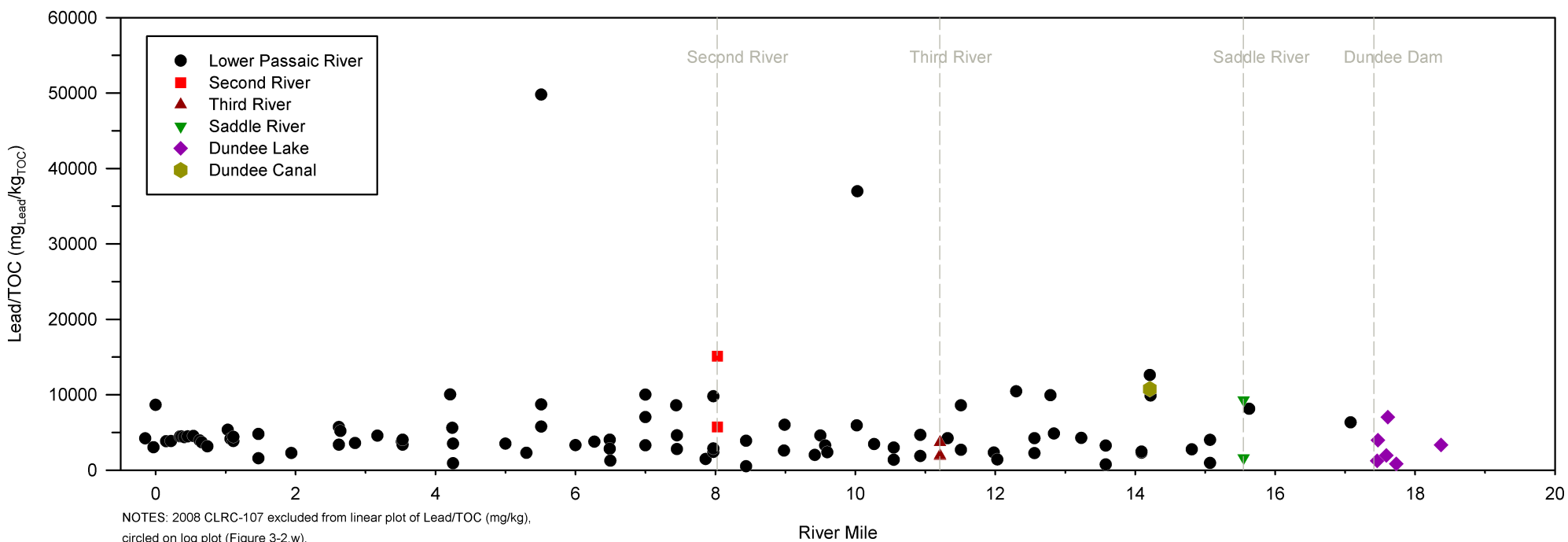
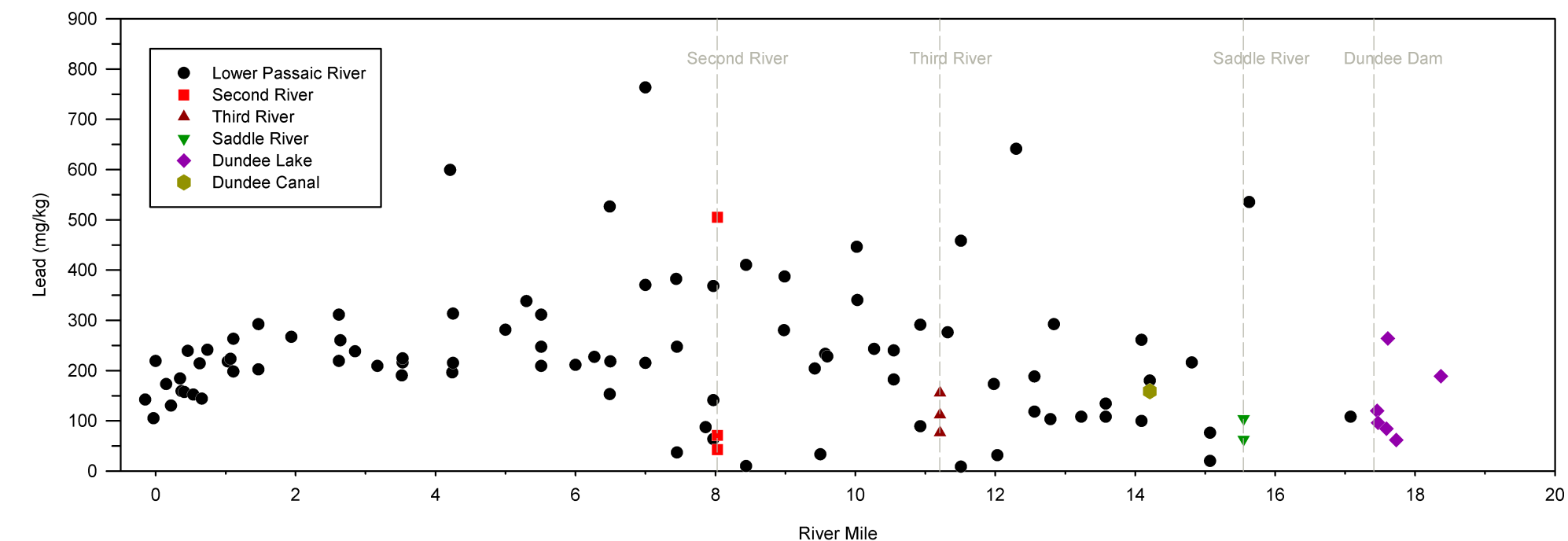
3-2.v Surficial Concentration vs. River Mile, Linear Scale - Copper
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



3-2.w Surficial Concentration vs. River Mile, Log Scale - Lead
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



3-2.x Surficial Concentration vs. River Mile, Linear Scale - Lead
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



NOTES: 2008 CLRC-107 excluded from linear plot of Lead/TOC (mg/kg),
 circled on log plot (Figure 3-2.w).

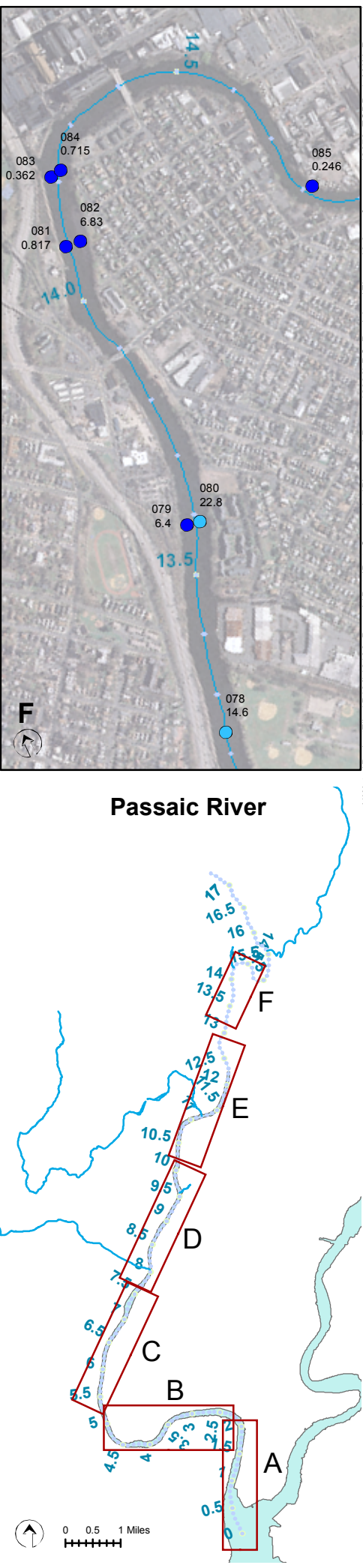
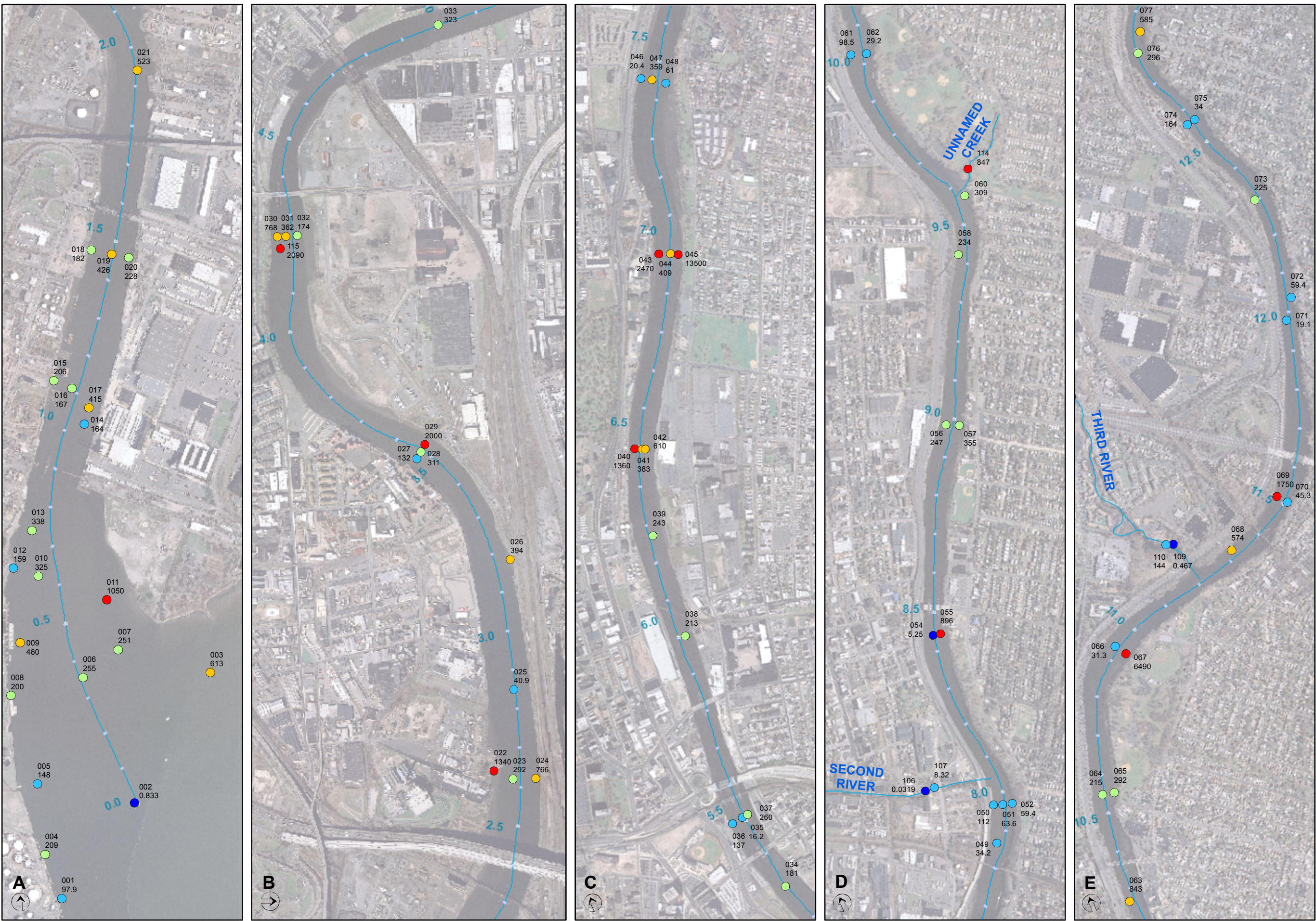
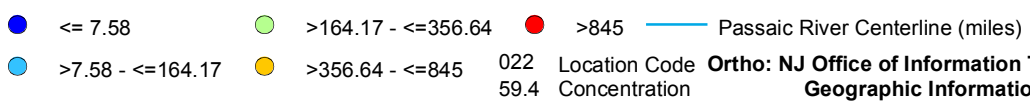
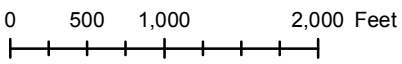


Figure 3-3.a 2008 LRC Surficial Analyte Concentration: 2,3,7,8-TCDD (ng/kg)
0 - 0.5 ft
(Page 1 of 2)



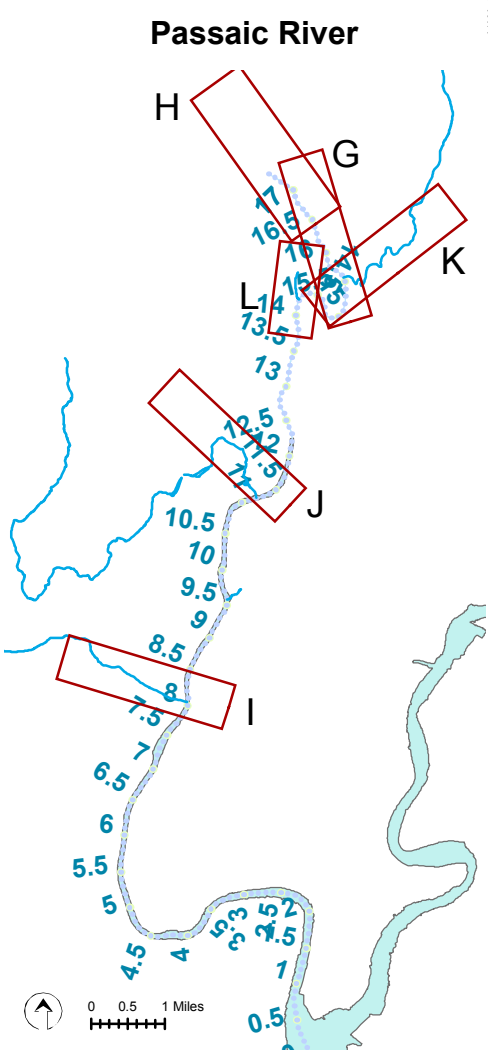
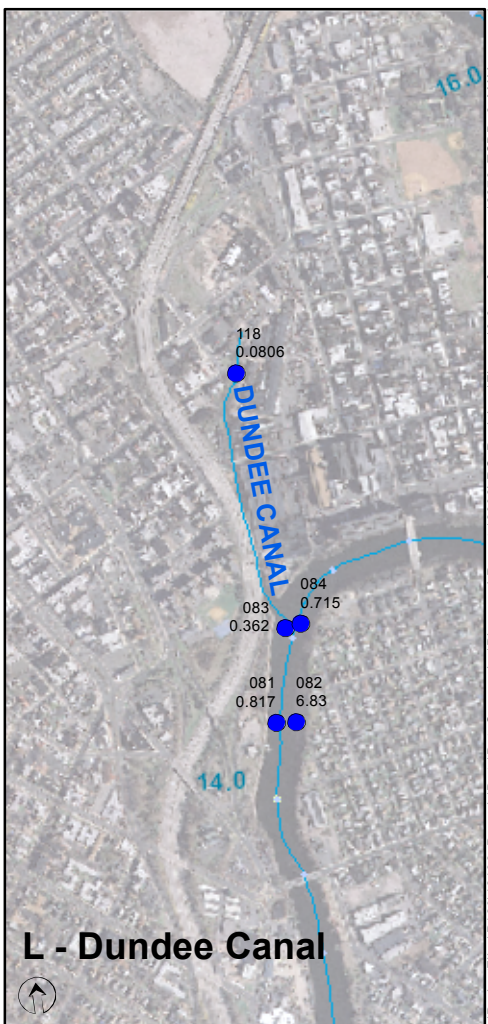
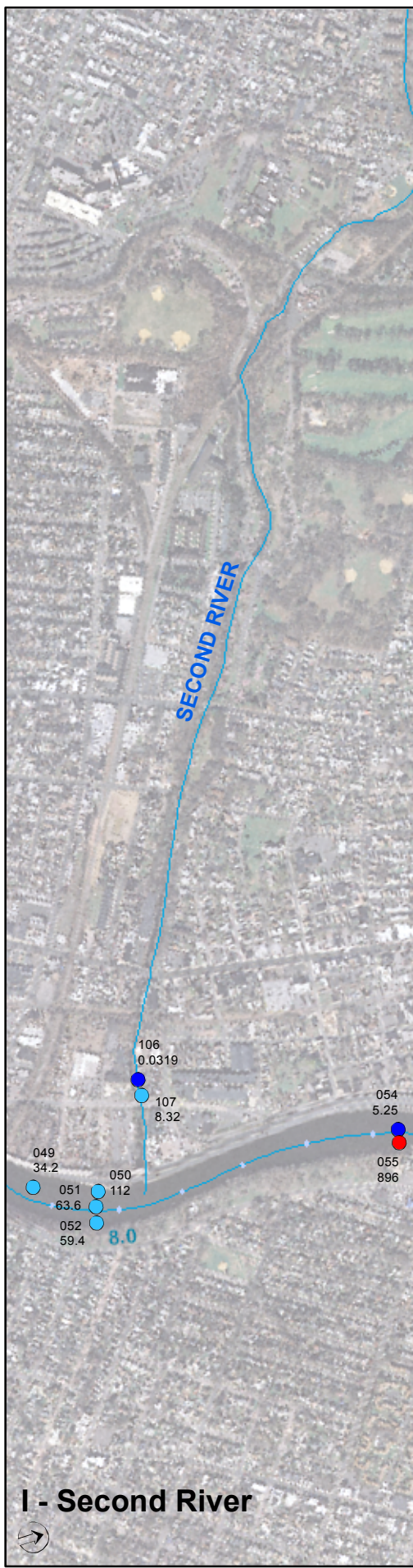
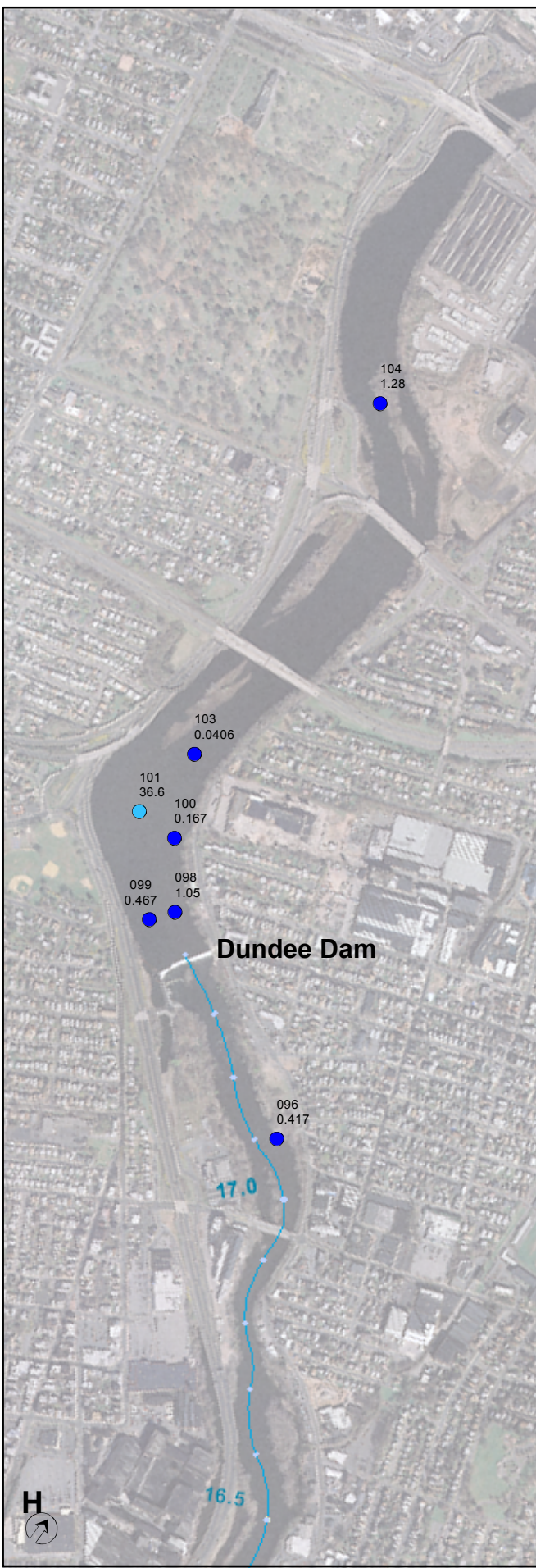
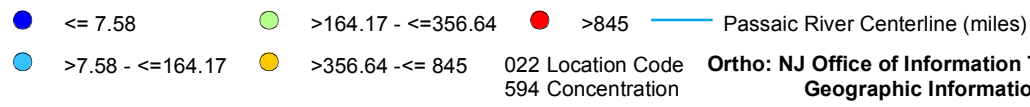
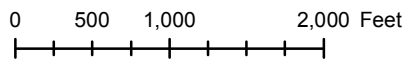


Figure 3-3.a 2008 LRC Surficial Analyte Concentration: 2,3,7,8-TCDD (ng/kg)
0 - 0.5 ft
(Page 2 of 2)



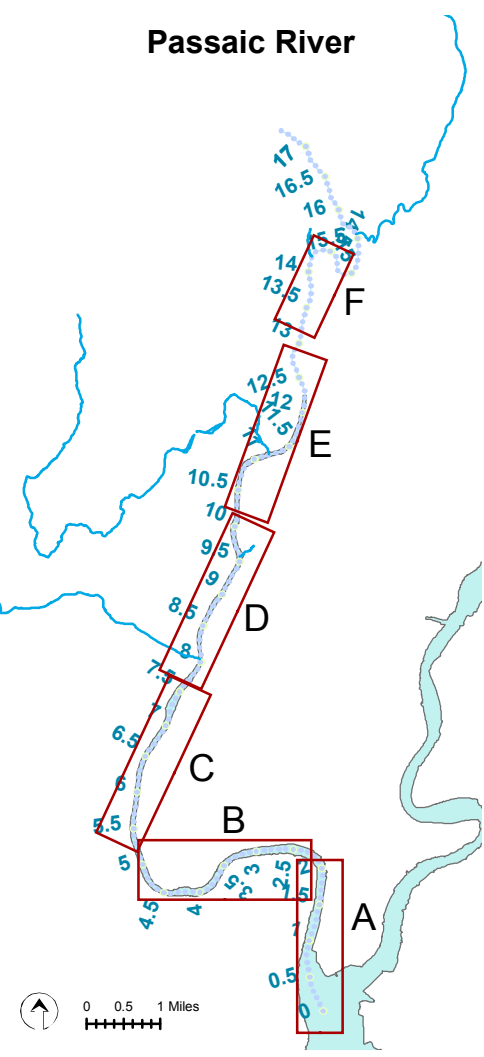
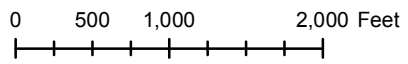


Figure 3-3.b 2008 LRC Surficial Analyte Concentration: Total TEQ (ng/kg)

0 - 0.5 ft
(Page 1 of 2)

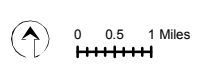
Total TEQ = The sum of dioxin, furan, and PCB human health TEQ detects. If all ND, reported as the highest individual TEQ DL.



- ≤ 20.7
- >20.7 - ≤ 207
- >420 - ≤ 915.2
- >207 - ≤ 420
- > 915.2
- Passaic River Centerline (miles)
- 022 Location Code
- 59.4 Concentration

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

AECOM
May 2011



J:\Water\Project\Files\12012162_PassaicData\Summaries\Plans and Reports\2008\RC_Revisions\Figures\3-3_surface_maps\TEQ_1_MAY_rev.mxd

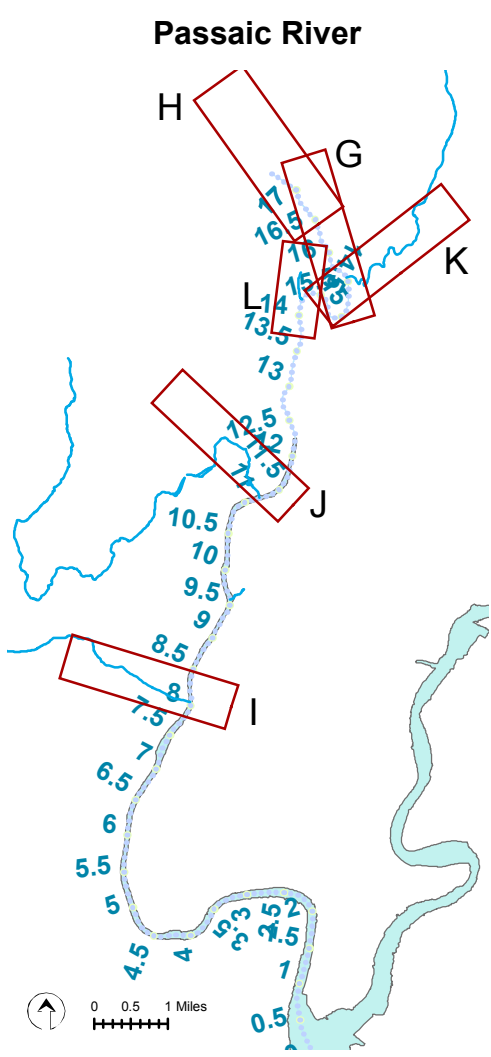
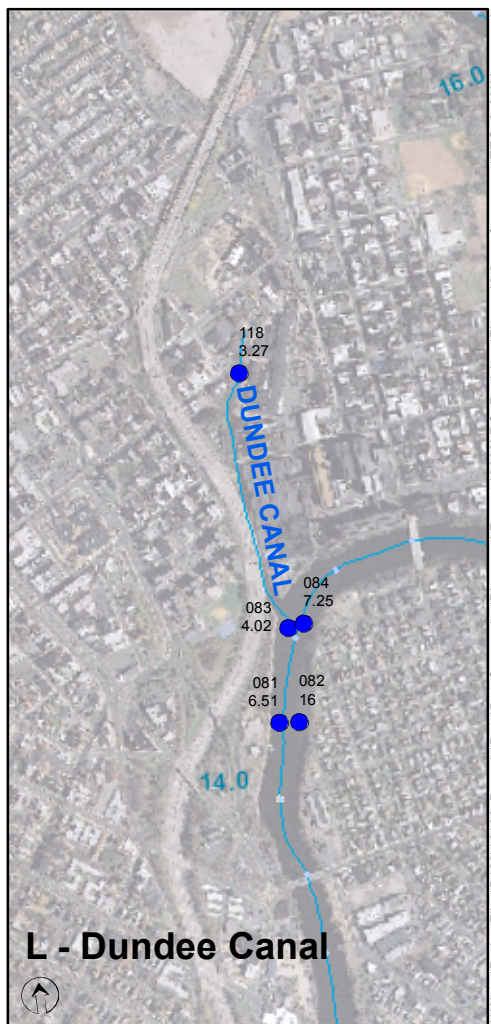
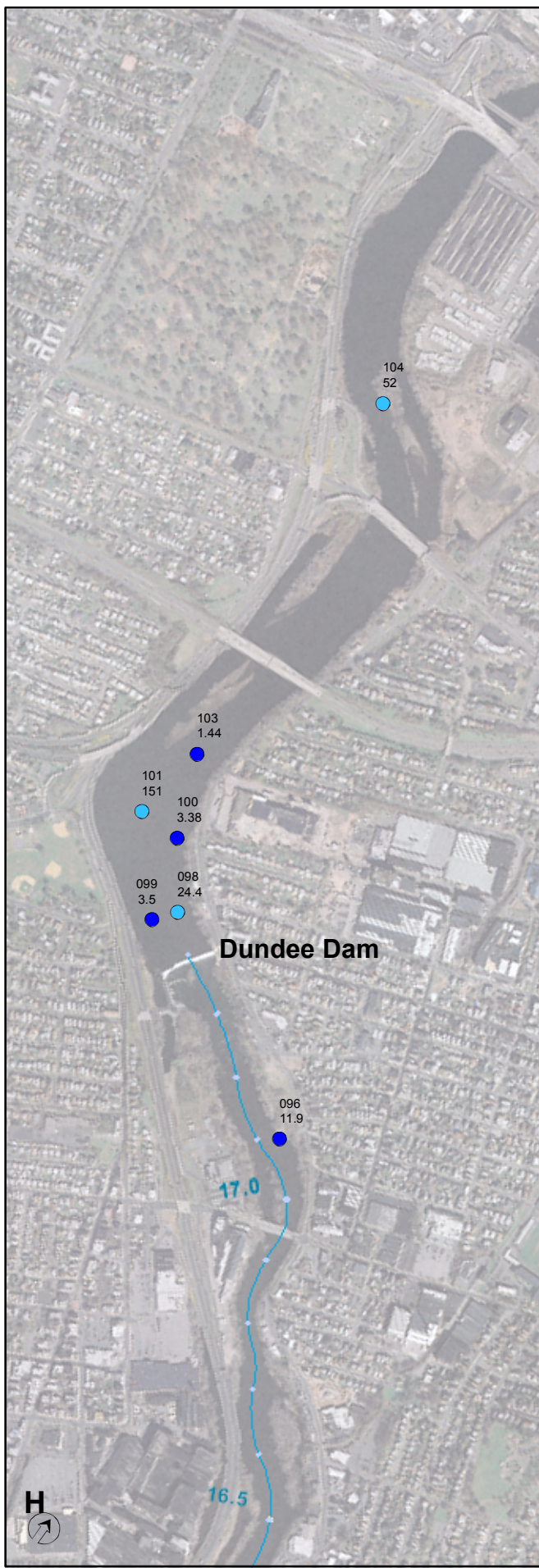
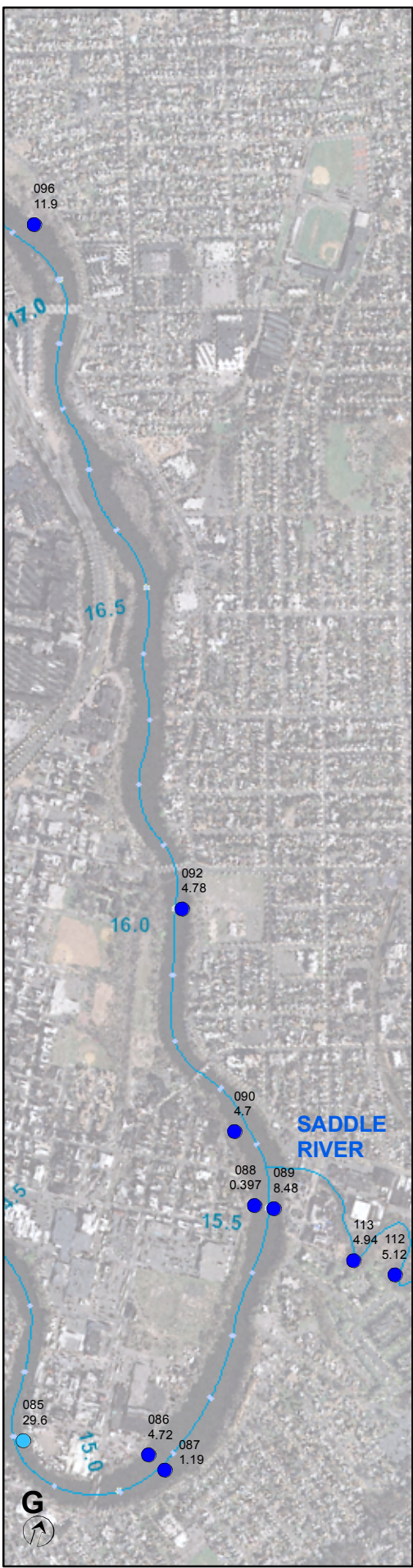
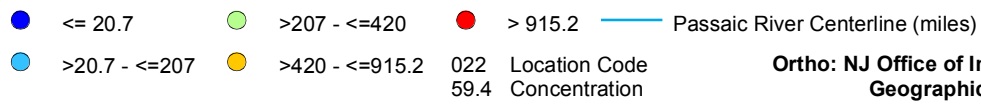
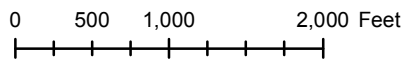


Figure 3-3.b 2008 LRC Surficial Analyte Concentration: Total TEQ (ng/kg)
0 - 0.5 ft
(Page 2 of 2)

Total TEQ = The sum of dioxin, furan, and PCB human health TEQ detects. If all ND, reported as the highest individual TEQ DL.



022 Location Code
59.4 Concentration

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

AECOM
May 2011



Figure 3-3.c 2008 LRC Surficial Analyte Concentration: Total PCBs (mg/kg)
0 - 0.5 ft
(Page 1 of 2)

NOTES: Total PCBs = The sum of PCB congener detects;
if all ND, reported as the highest individual congener DL.

0 500 1,000 2,000 Feet

- ≤ 0.154
- >0.154 - ≤0.723
- >0.723 - ≤1.210
- >1.210 - ≤2.112
- >2.112
- 022 59.4 Location Code Concentration

Passaic River Centerline (miles)

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

AECOM
May 2011

0 0.5 1 Miles

J:\Water\ProjectFiles\PI2012182_PassaicData\Summaries\Plans and Reports\2008\RC_Revisions\Figures\3-3_surface_maps\Total_PCB_1_MAY_Rev.mxd

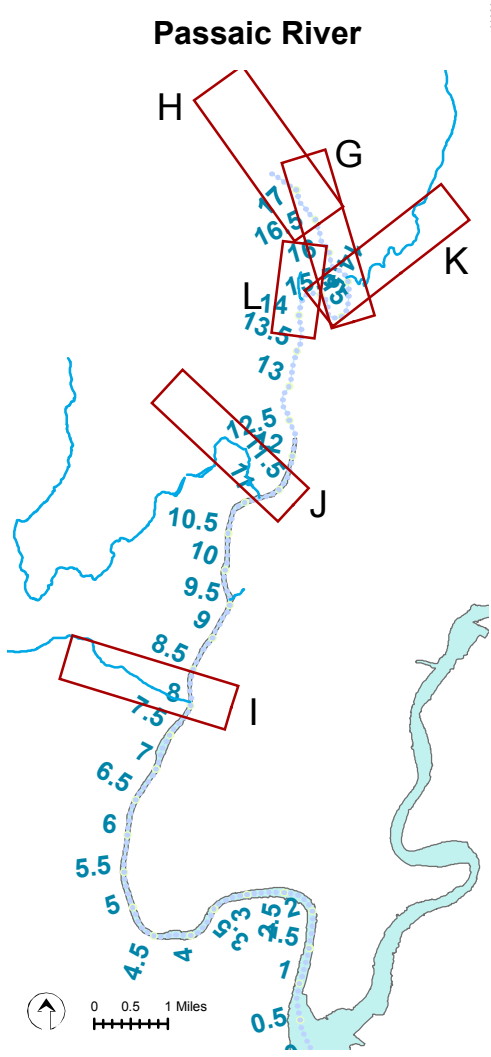
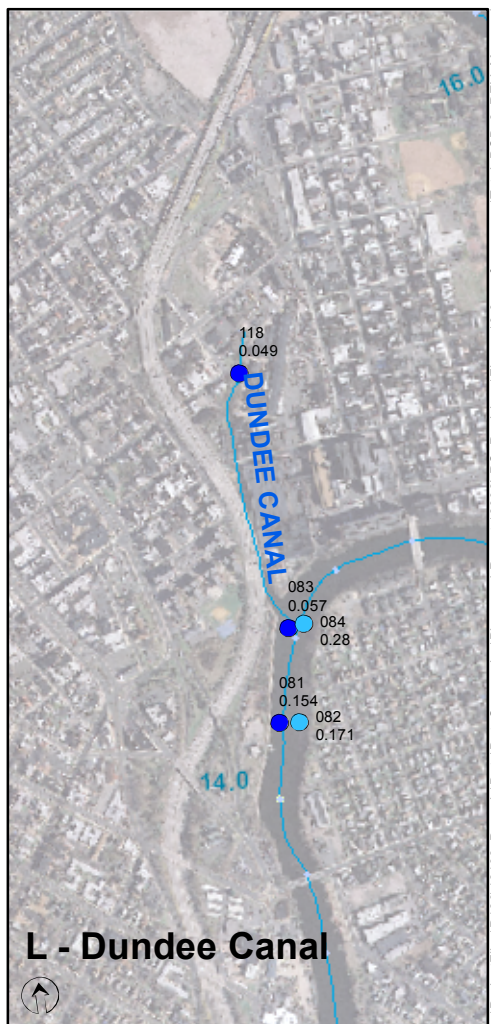
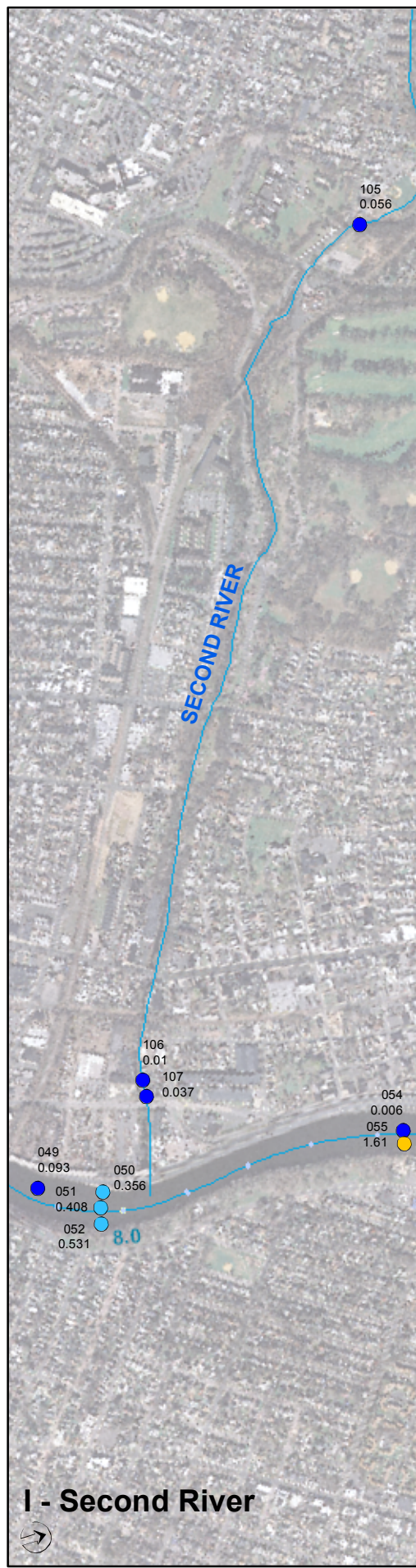
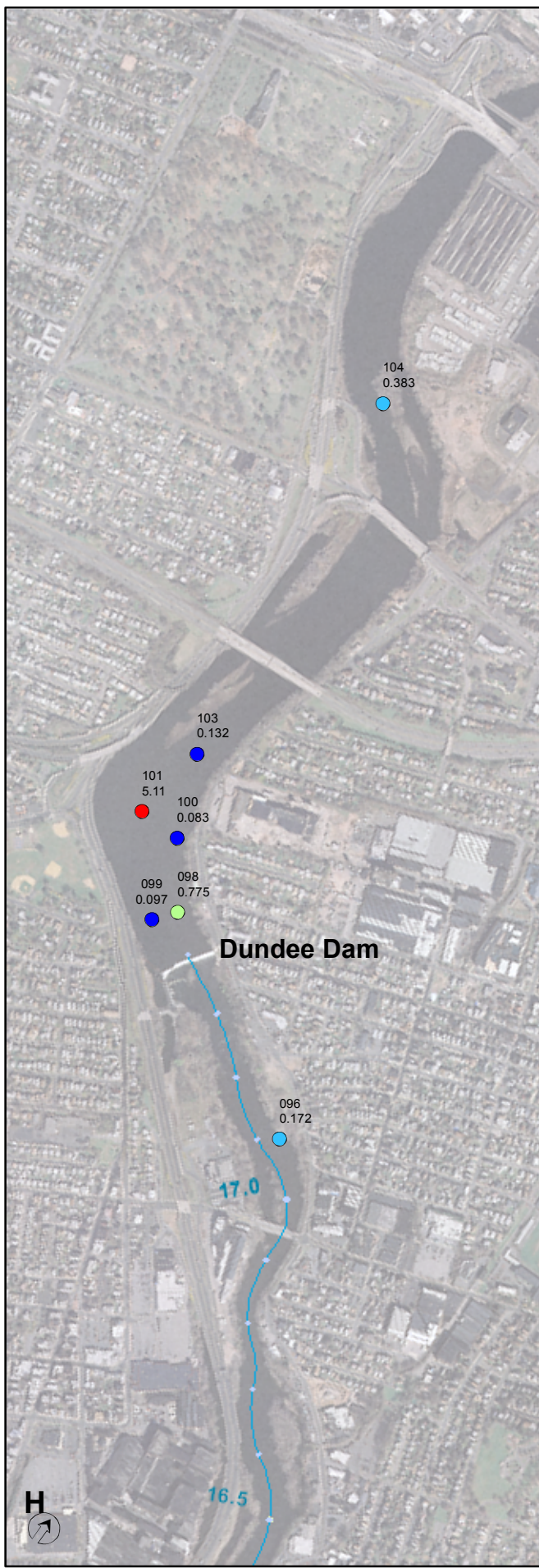
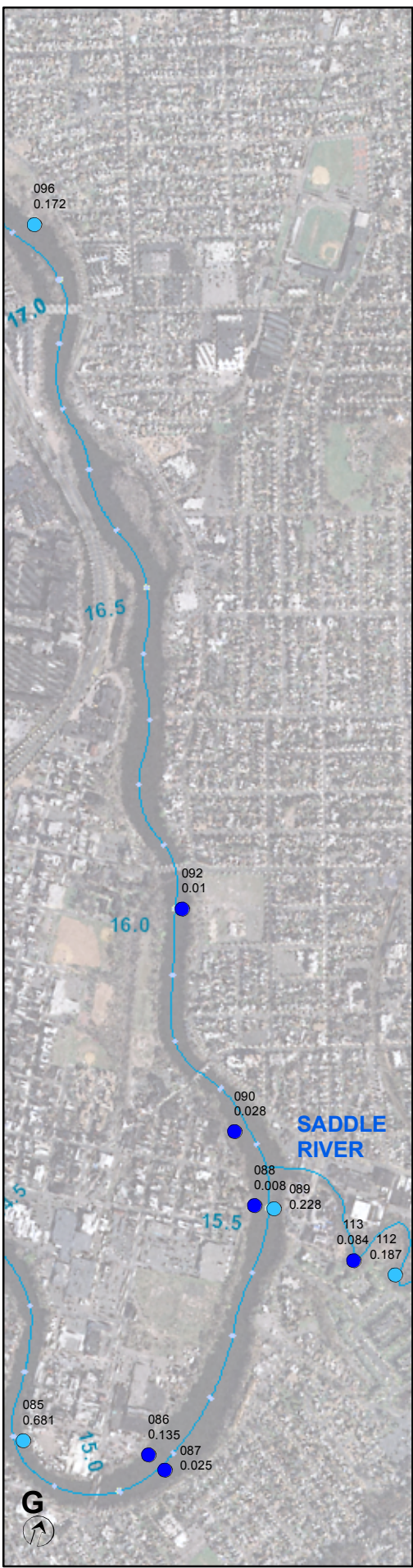
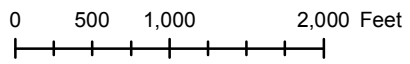


Figure 3-3.c 2008 LRC Surficial Analyte Concentration: Total PCBs (mg/kg)
0 - 0.5 ft
(Page 2 of 2)

NOTES: Total PCBs = The sum of PCB congener detects; if all ND, reported as the highest individual congener DL.

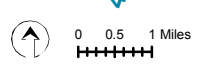


- ≤ 0.154
- >0.154 - ≤0.723
- >0.723 - ≤1.210
- >1.210 - ≤2.112
- >2.112
- Passaic River Centerline (miles)

022 Location Code
59.4 Concentration

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

AECOM
 May 2011



J:\Water\ProjectFiles\P12012182_PassaicData\Summaries\Plans and Reports\2008\RC_Revisions\Figures\3-3_surface_maps\Total_PCB_2_REV_May.mxd

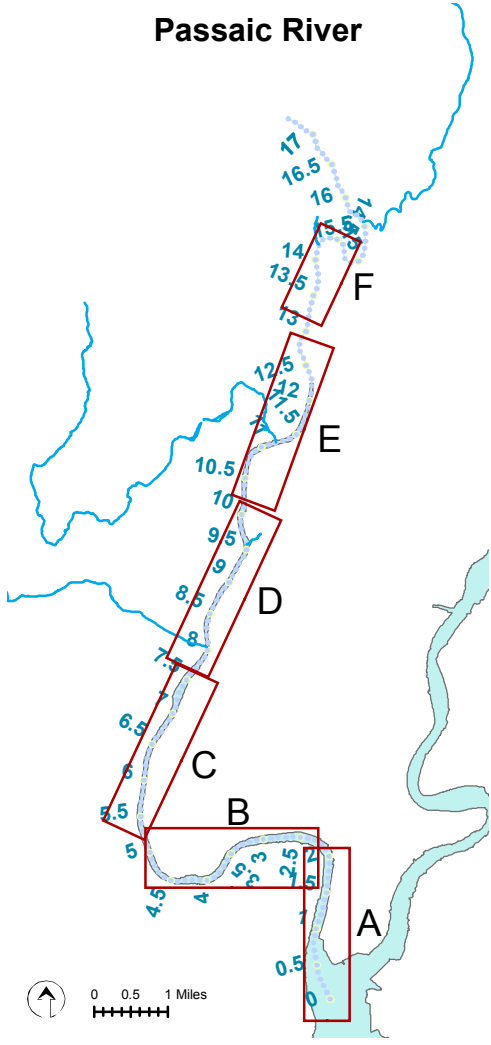
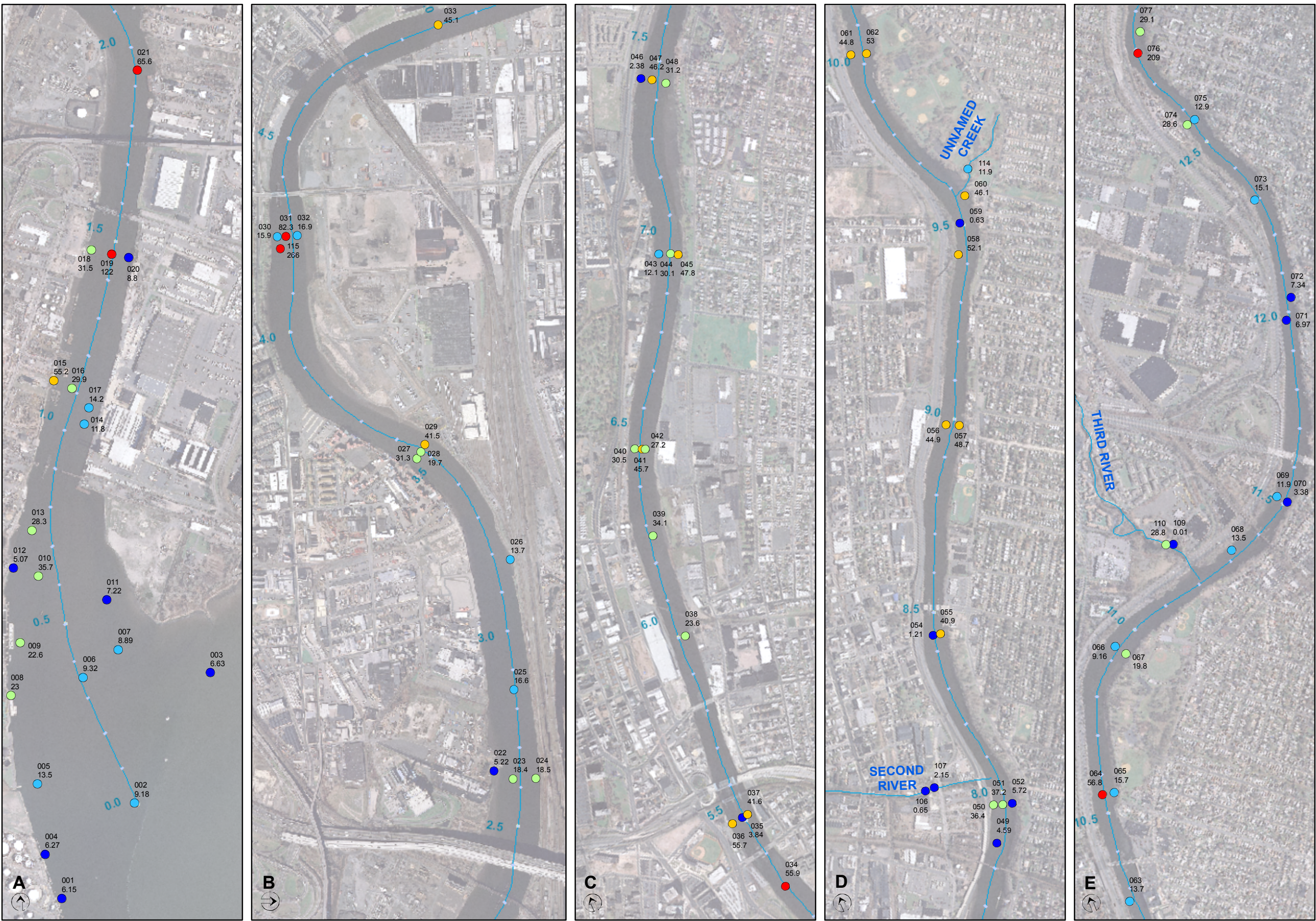


Figure 3-3.d 2008 LRC Surficial Analyte Concentration: HMW PAHs (mg/kg)

0 - 0.5 ft (Page 1 of 2) NOTES: HMW PAHs = The sum of Benz[a]anthracene, Benzo[a]pyrene, Benzo[b]fluoranthene, Benzo[g,h,i]perylene, Benzo[k]fluoranthene, Chrysene, Dibenzo[a,h]anthracene, Fluoranthene, Indeno[1,2,3-cd]pyrene and Pyrene detects; if all ND, reported as highest individual analyte DL.

Legend: Blue dot: <= 8.80, Green dot: >16.90 - <=37.20, Red dot: >55.74, Light blue dot: >8.80 - <=16.90, Yellow dot: >37.20 - <=55.74. Passaic River Centerline (miles)

022 Location Code 59.4 Concentration

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

AECOM May 2011

0 0.5 1 Miles

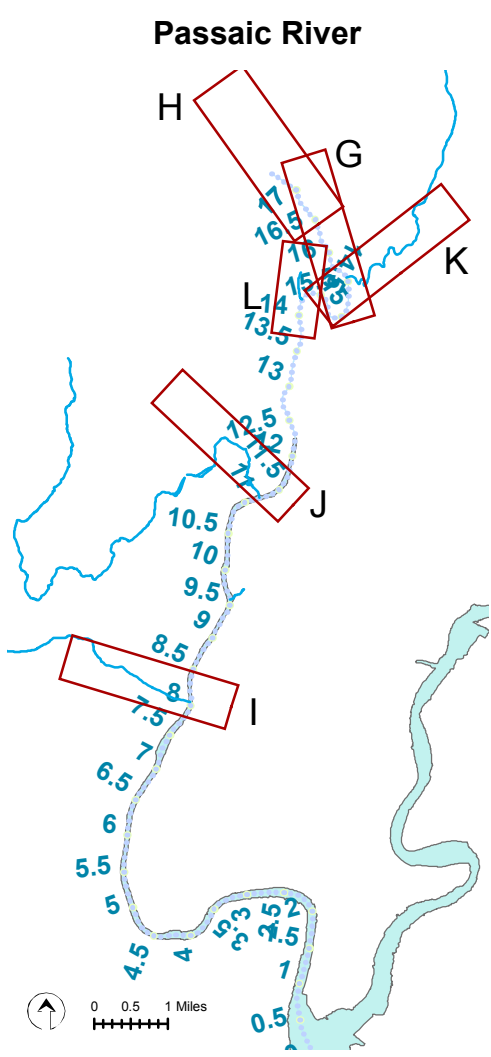
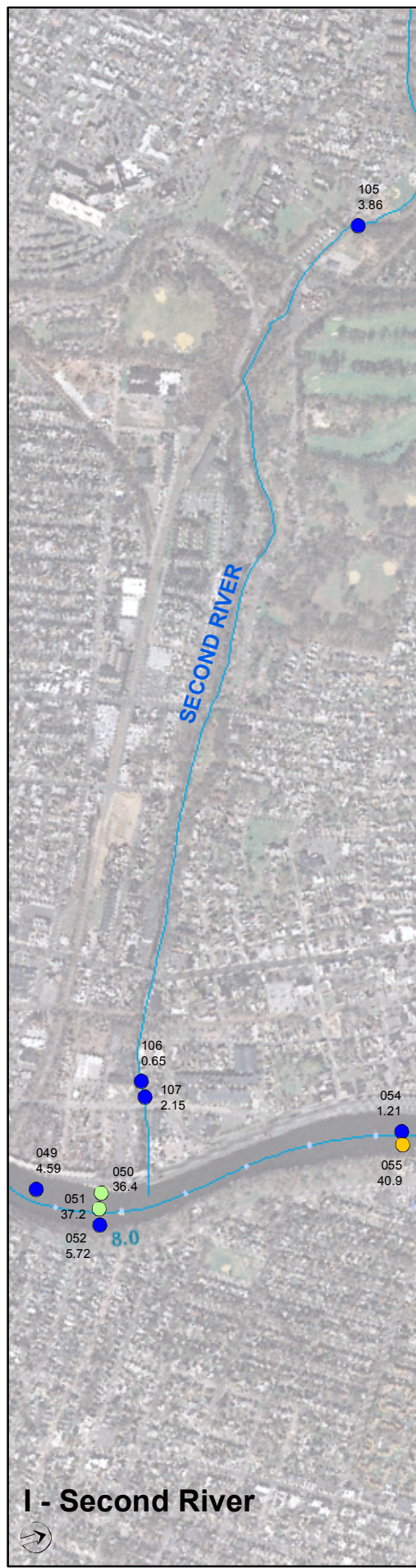
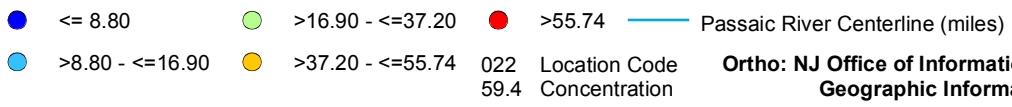
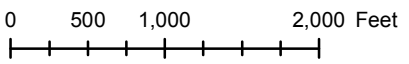


Figure 3-3.d 2008 LRC Surficial Analyte Concentration: HMW PAHs (mg/kg)
0 - 0.5 ft
(Page 2 of 2)

NOTES: HMW PAHs = The sum of Benz[a]anthracene, Benzo[a]pyrene, Benzo[b]fluoranthene, Benzo[g,h,i]perylene, Benzo[k]fluoranthene, Chrysene, Dibenzo[a,h]anthracene, Fluoranthene, Indeno[1,2,3-cd]pyrene and Pyrene detects; if all ND, reported as highest individual analyte DL.



022 Location Code
59.4 Concentration

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

AECOM
May 2011

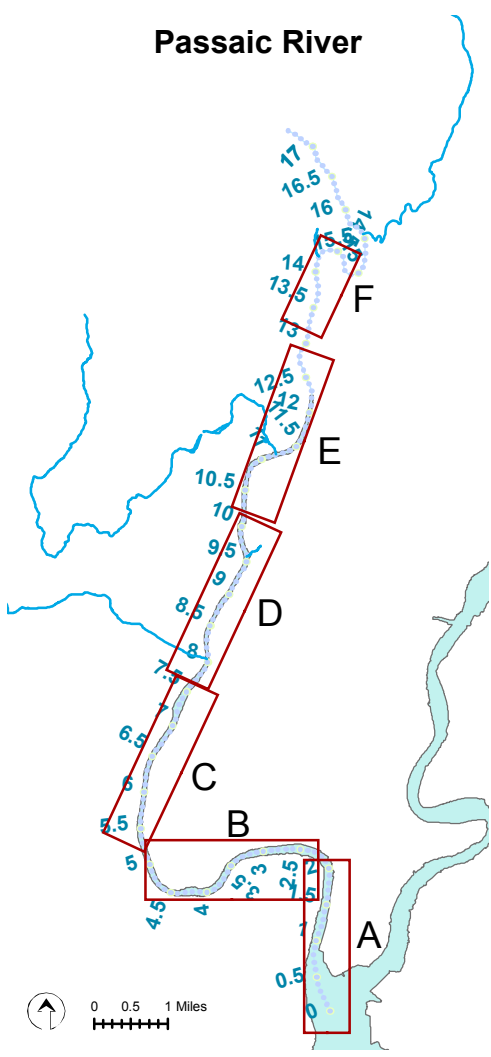
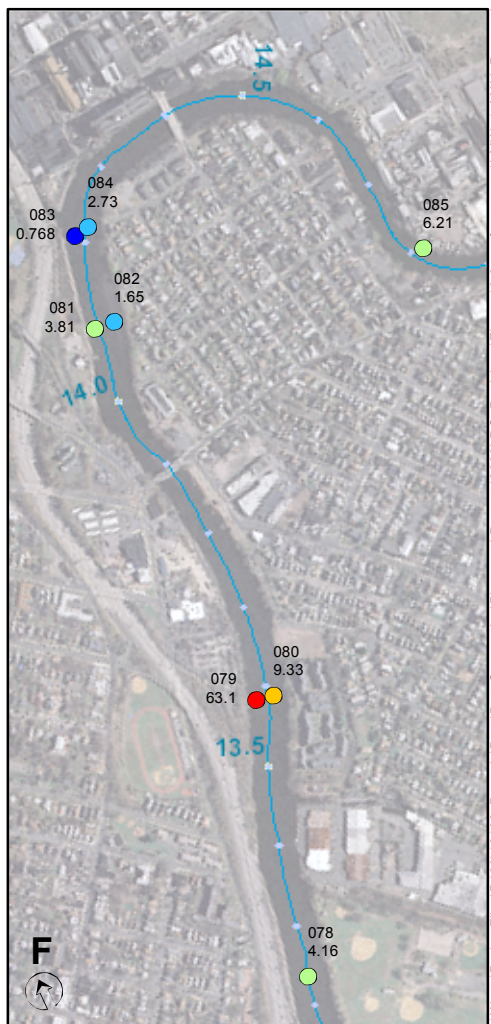
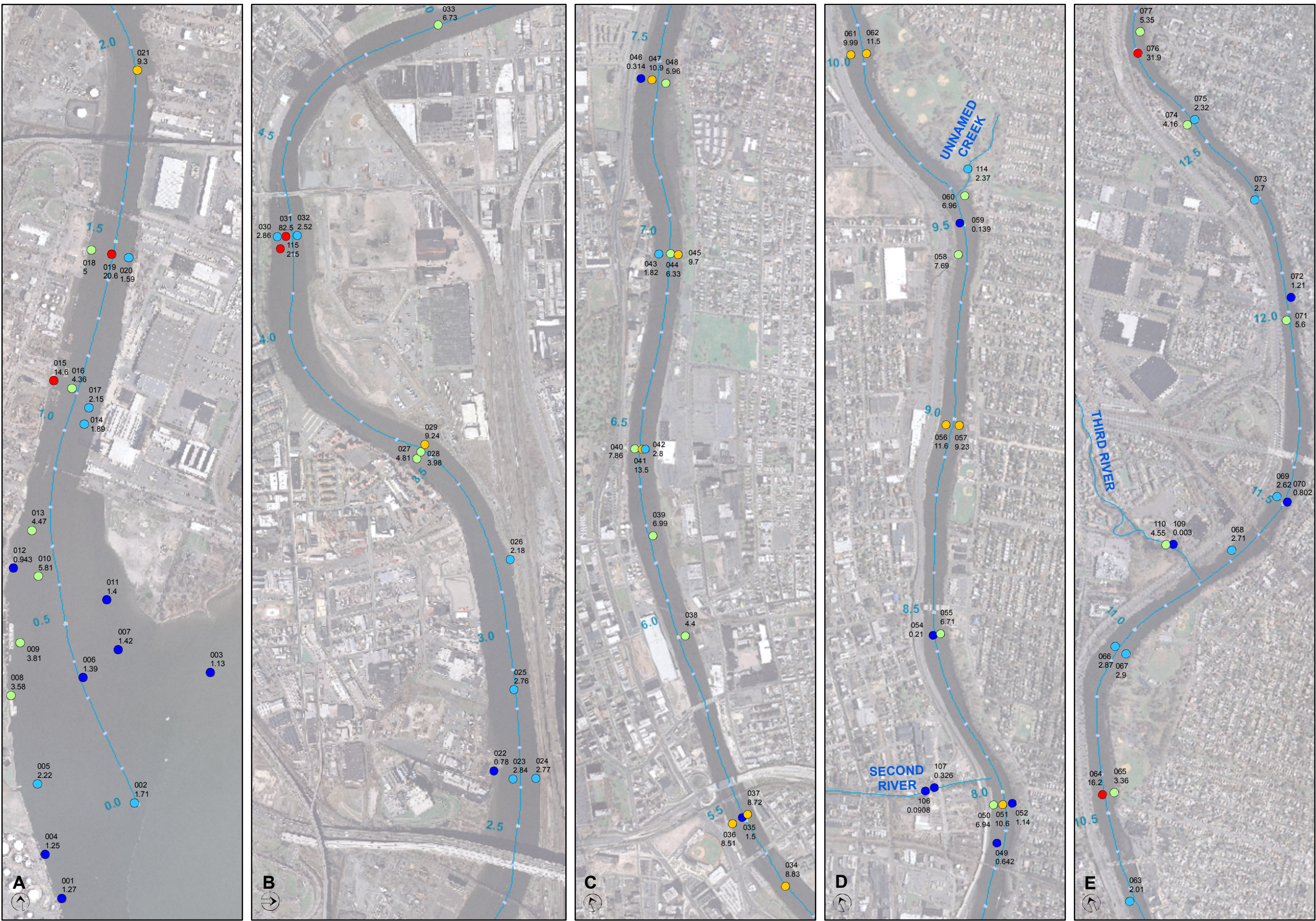
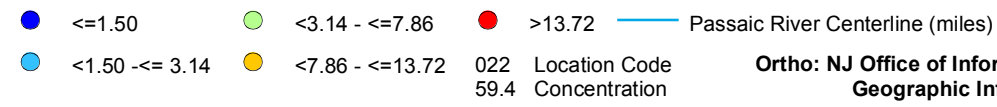
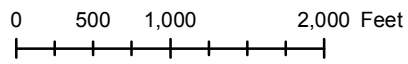


Figure 3-3.e 2008 LRC Surficial Analyte Concentration: LMW PAHs (mg/kg)
0 - 0.5 ft
(Page 1 of 2)

NOTES: LMW PAHs = The sum of Acenaphthene, Acenaphthylene, Anthracene, Fluorene, Napthalene, and Phenanthrene detects; if all ND, reported as the highest individual analyte DL.



AECOM
May 2011
Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

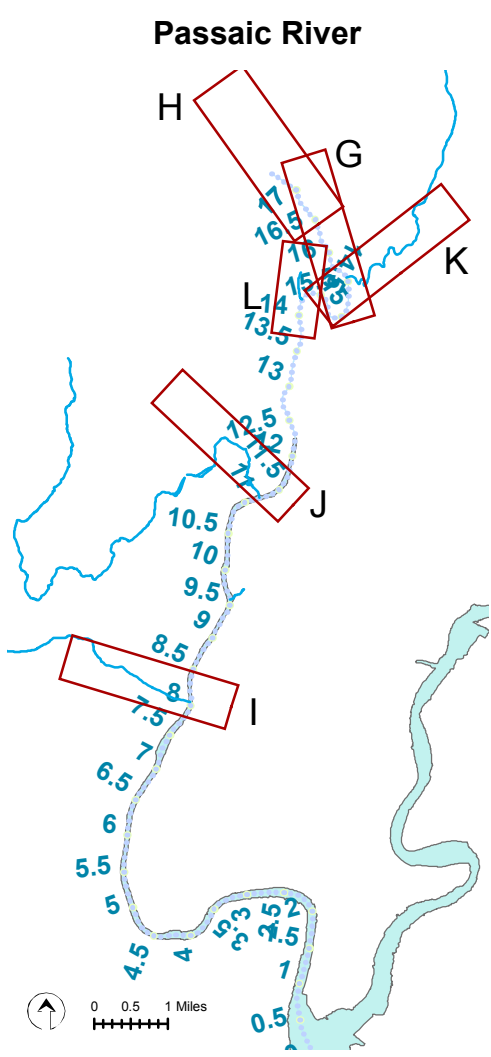
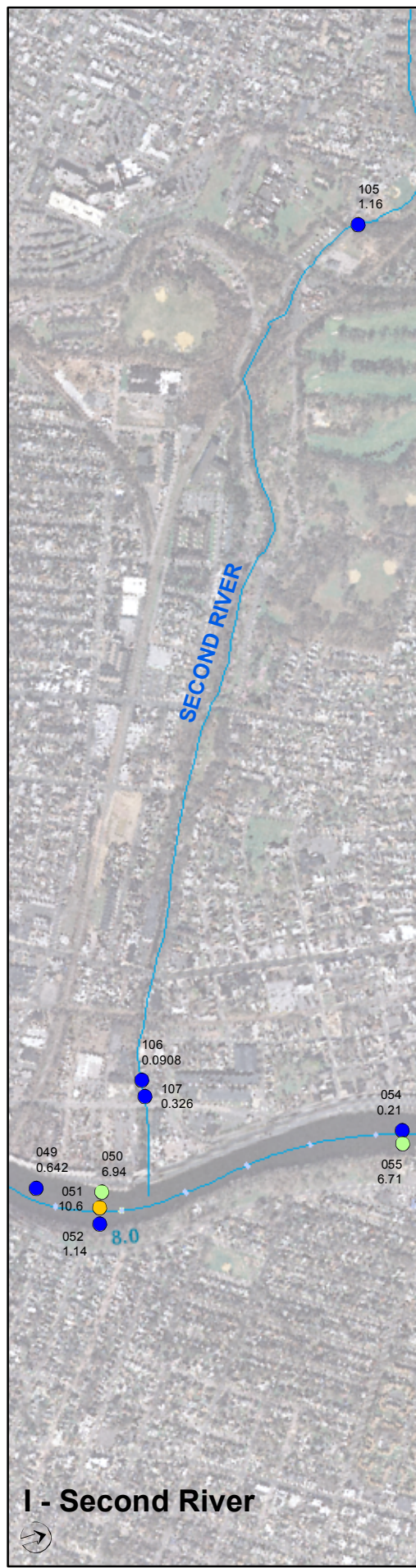
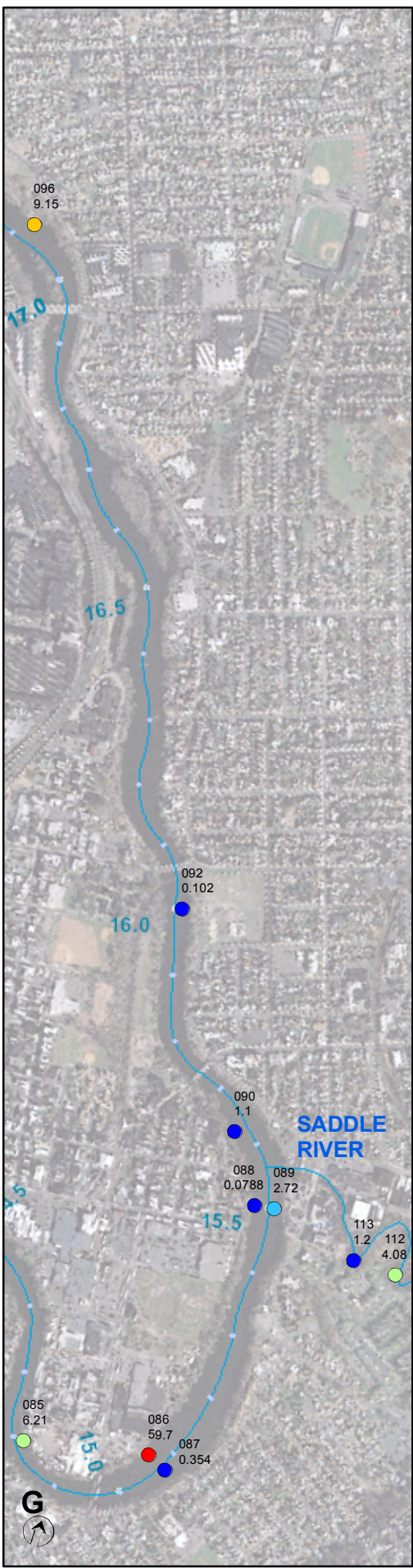
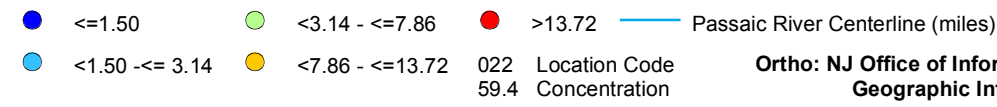
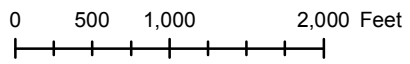


Figure 3-3.e 2008 LRC Surficial Analyte Concentration: LMW PAH (mg/kg)
0 - 0.5 ft
(Page 2 of 2)

NOTES: LMW PAHs = The sum of Acenaphthene, Acenaphthylene, Anthracene, Fluorene, Naphthalene, and Phenanthrene detects; if all ND, reported as the highest individual analyte DL.



022 Location Code
59.4 Concentration

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

AECOM
May 2011

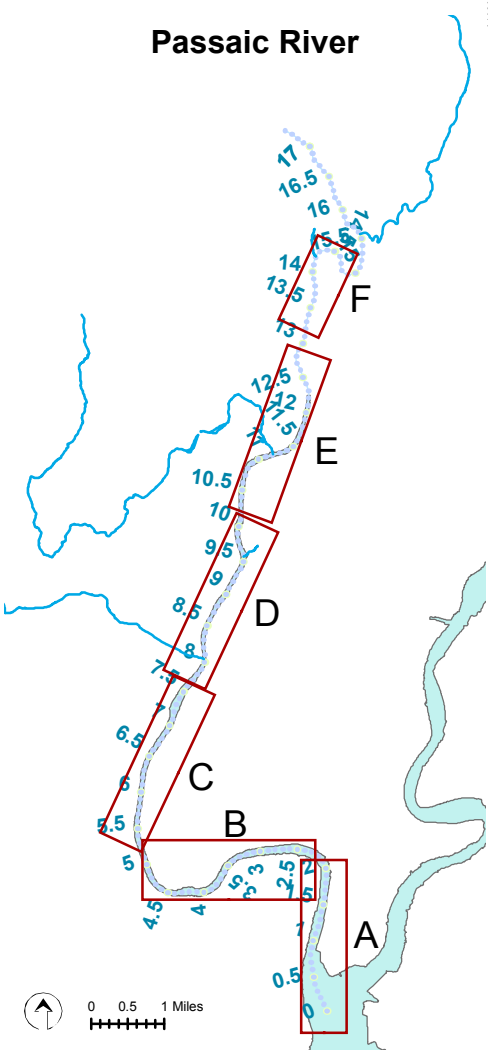
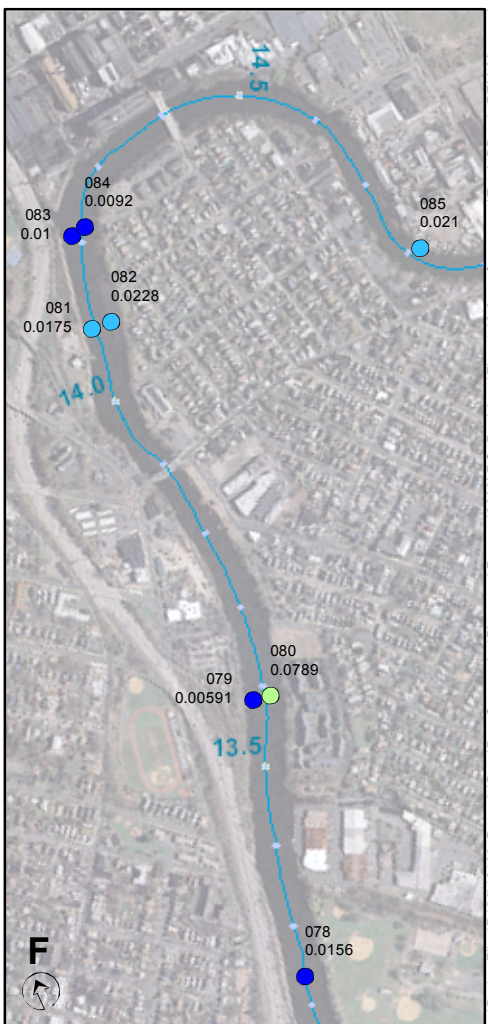
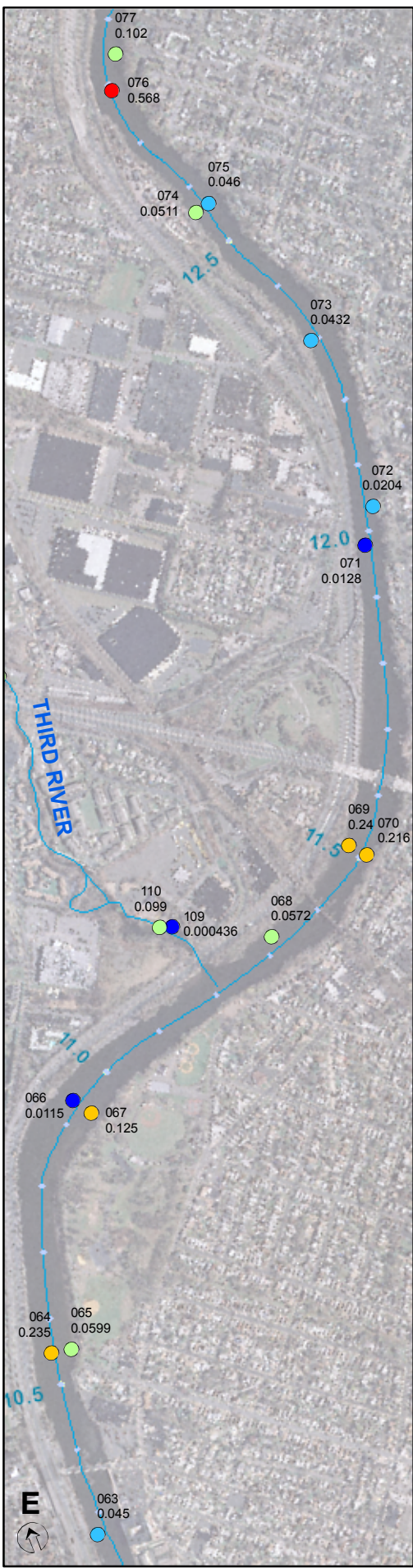
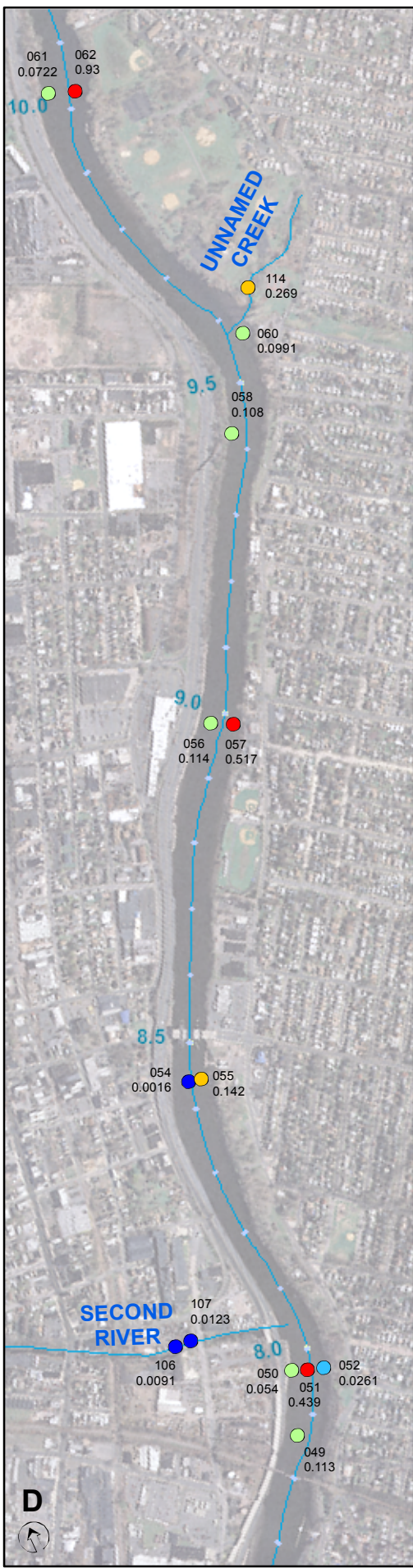
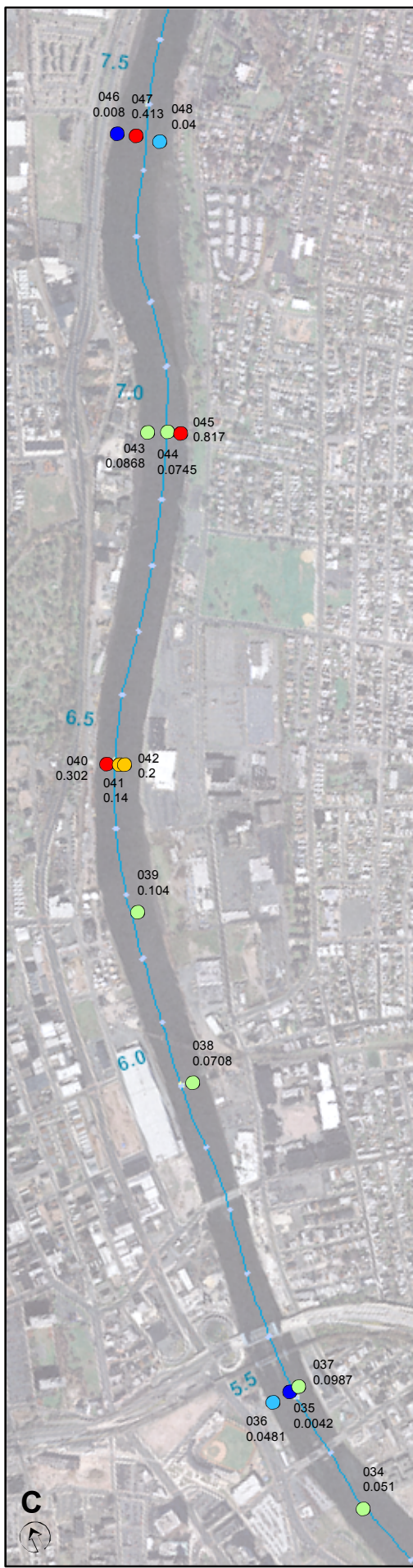
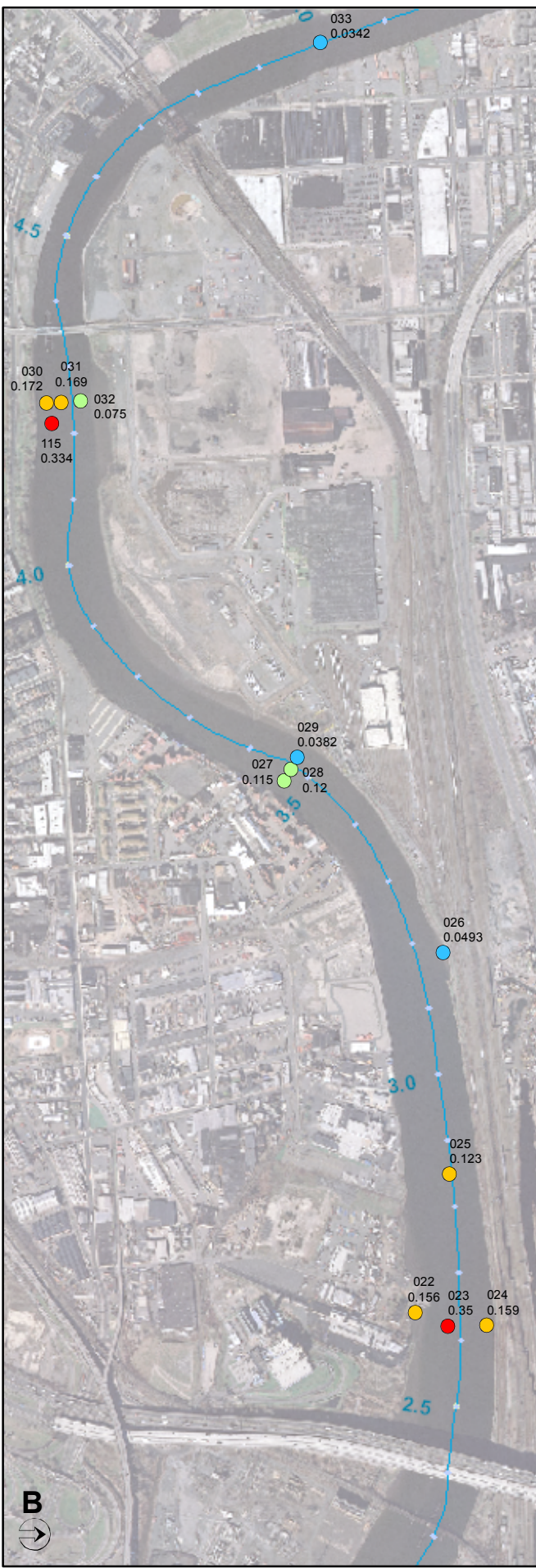
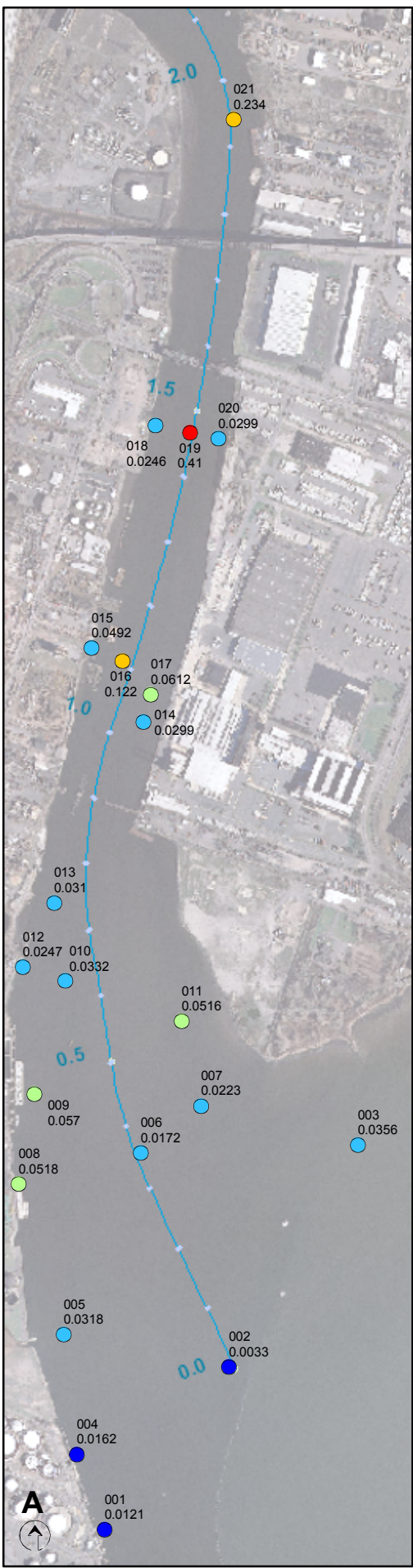
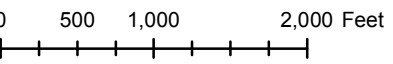


Figure 3-3.f 2008 LRC Surficial Analyte Concentration: Total DDx (mg/kg)
0 - 0.5 ft
(Page 1 of 2)

NOTES: Total DDx = The sum of 4,4'-DDD, 4,4'-DDE, and 4,4'-DDT detects; 0 if all ND, reported as the highest individual analyte DL.



- <=0.0165
- >0.0165 - <=0.050
- >0.050 - <=0.121
- >0.121 - <=0.279
- >0.279
- Passaic River Centerline (miles)

022 Location Code
59.4 Concentration

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

AECOM
May 2011

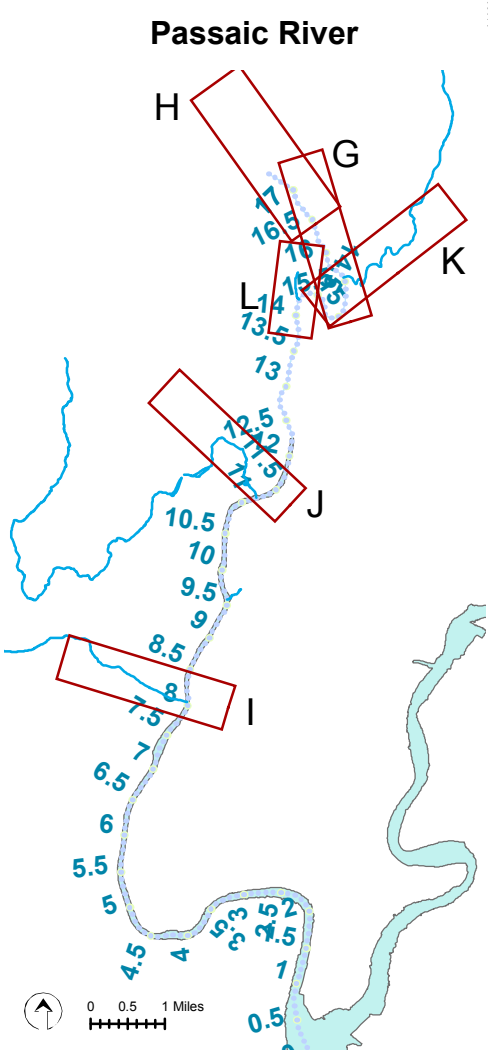
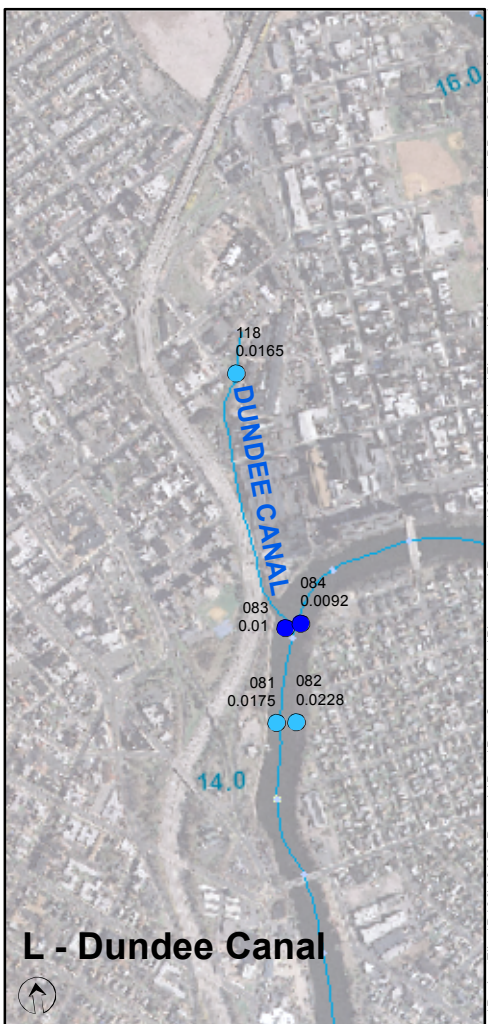
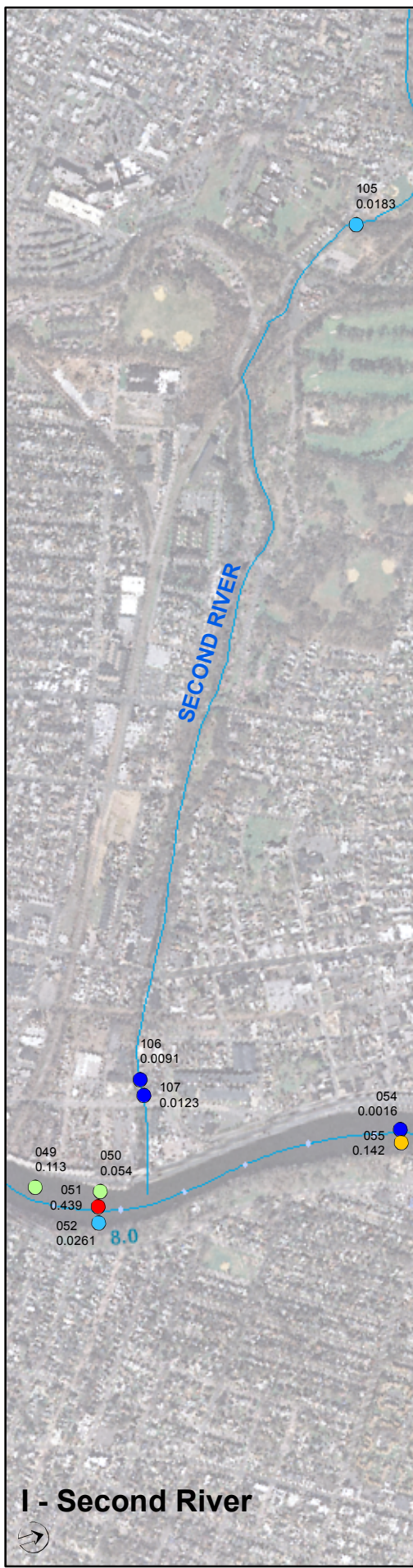
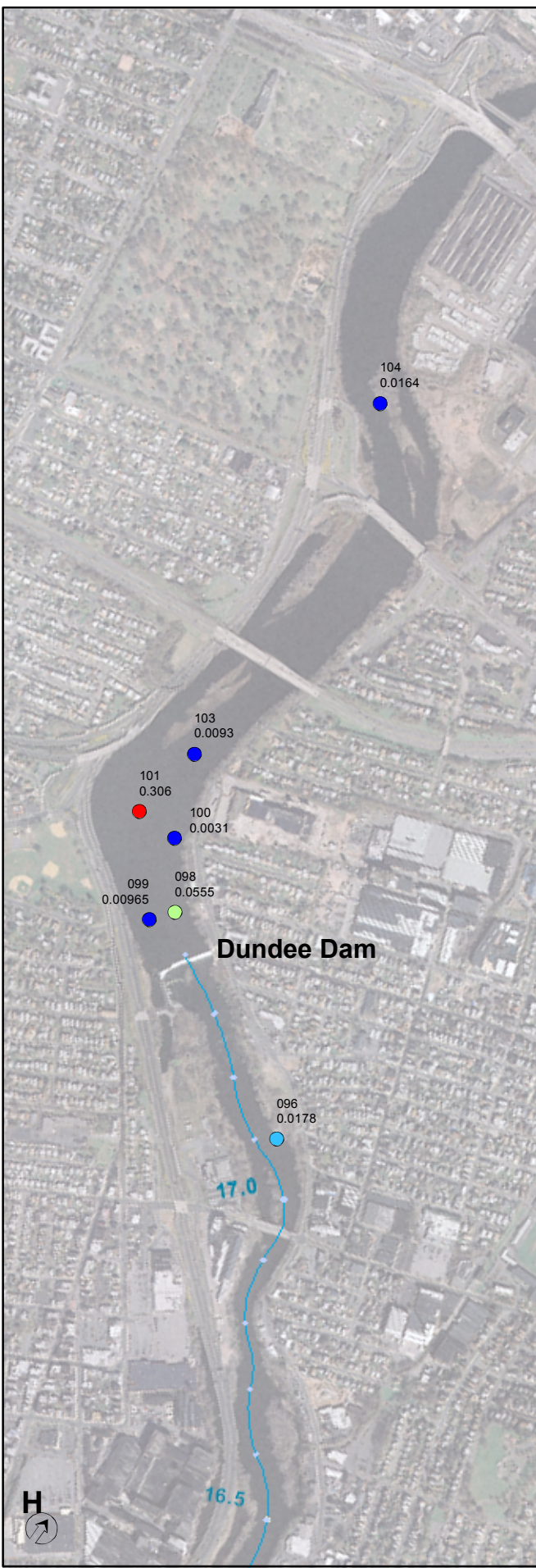
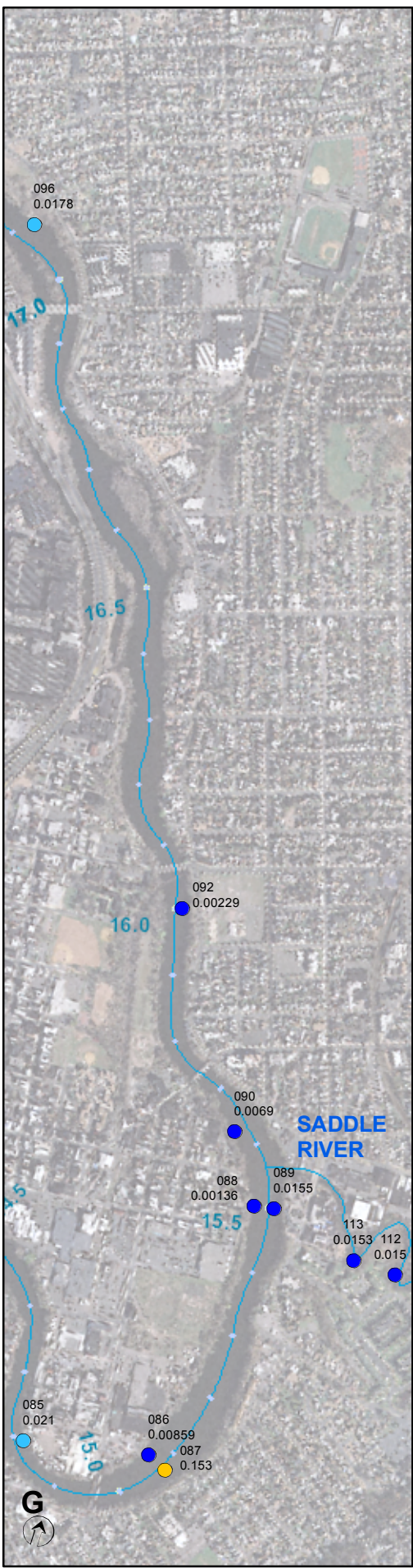
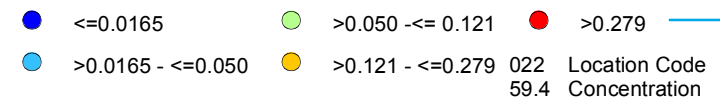
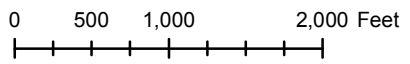


Figure 3-3.f 2008 LRC Surficial Analyte Concentration: Total DDx (mg/kg)
0 - 0.5 ft
(Page 2 of 2)

NOTES: Total DDx = The sum of 4,4'-DDD, 4,4'-DDE, and 4,4'-DDT detects; if all ND, reported as the highest individual analyte DL.



Passaic River Centerline (miles)

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

AECOM
May 2011

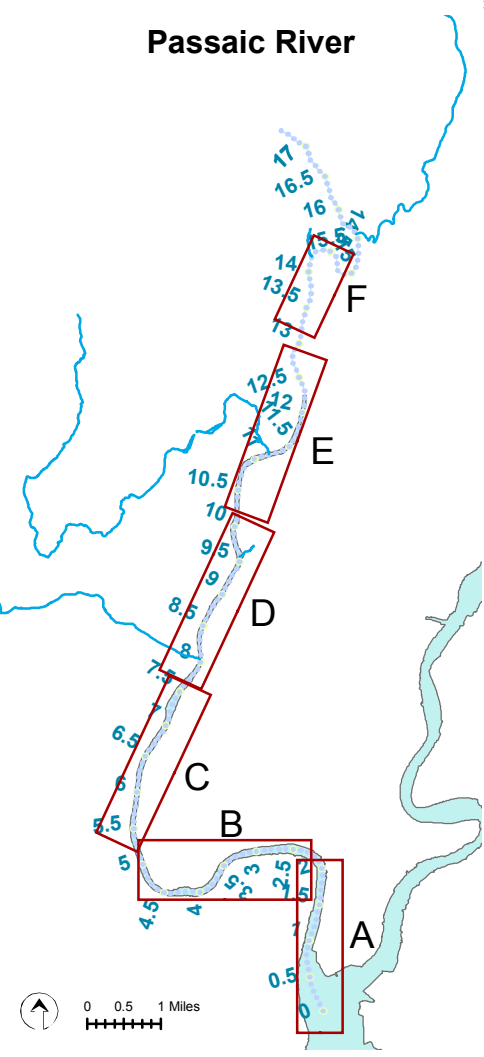
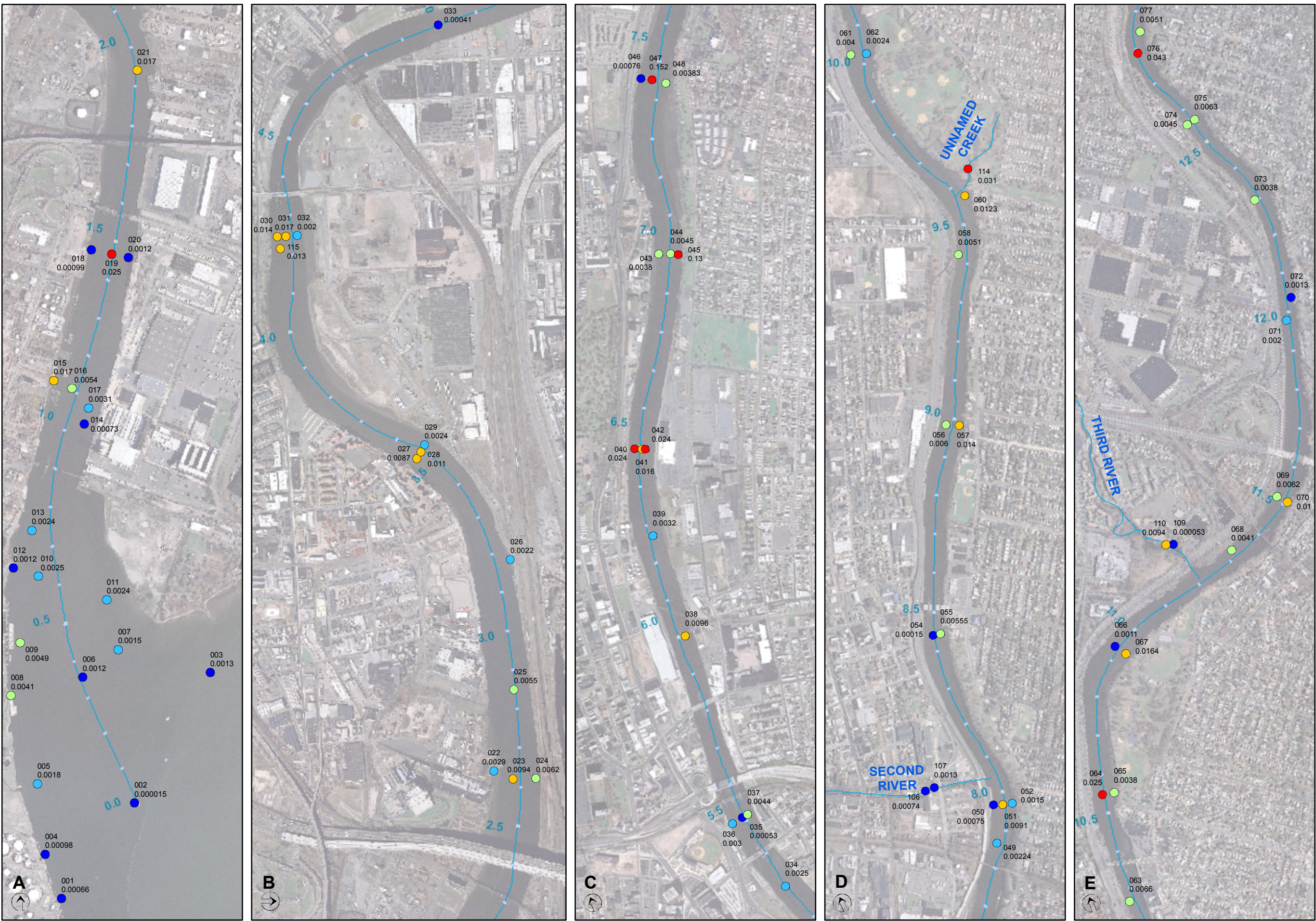


Figure 3-3.g 2008 LRC Surficial Analyte Concentration: Dieldrin (mg/kg)
0 - 0.5 ft
(Page 1 of 2)

● ≤ 0.0014

● >0.0014 - ≤ 0.0034

● >0.0034 - ≤ 0.0071

● >0.0071 - ≤ 0.0170

● > 0.0170

022
59.4

Location
Concentration

— Passaic River Centerline (miles)

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

AECOM

May 2011

0 500 1,000 2,000 Feet

0 0.5 1 Miles

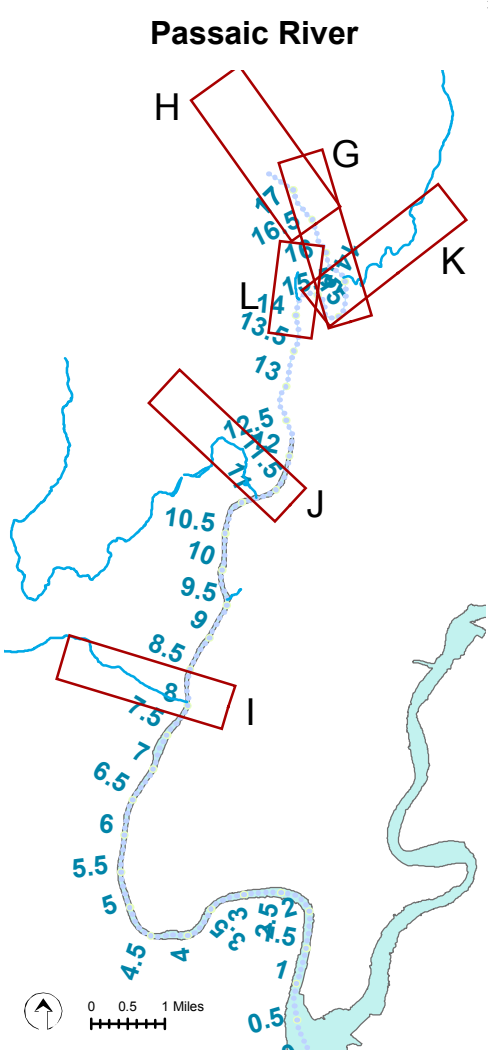
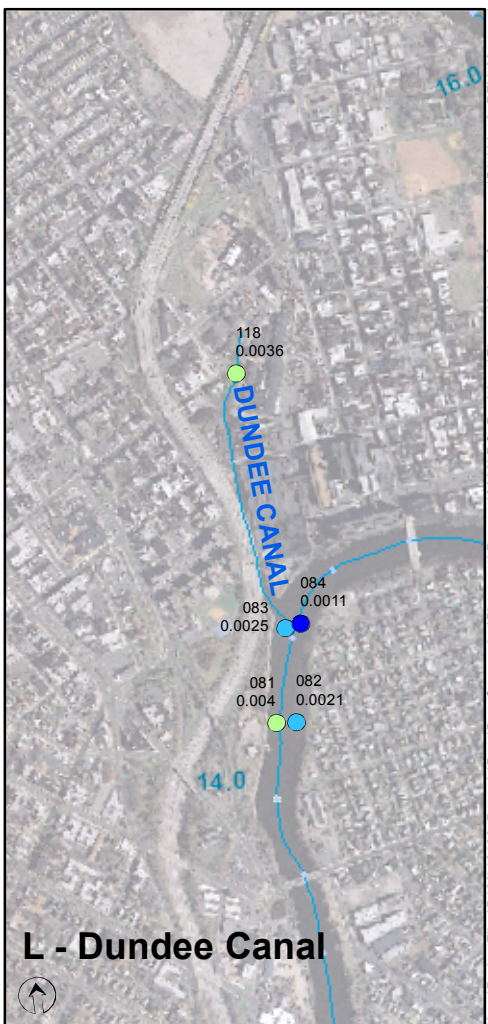
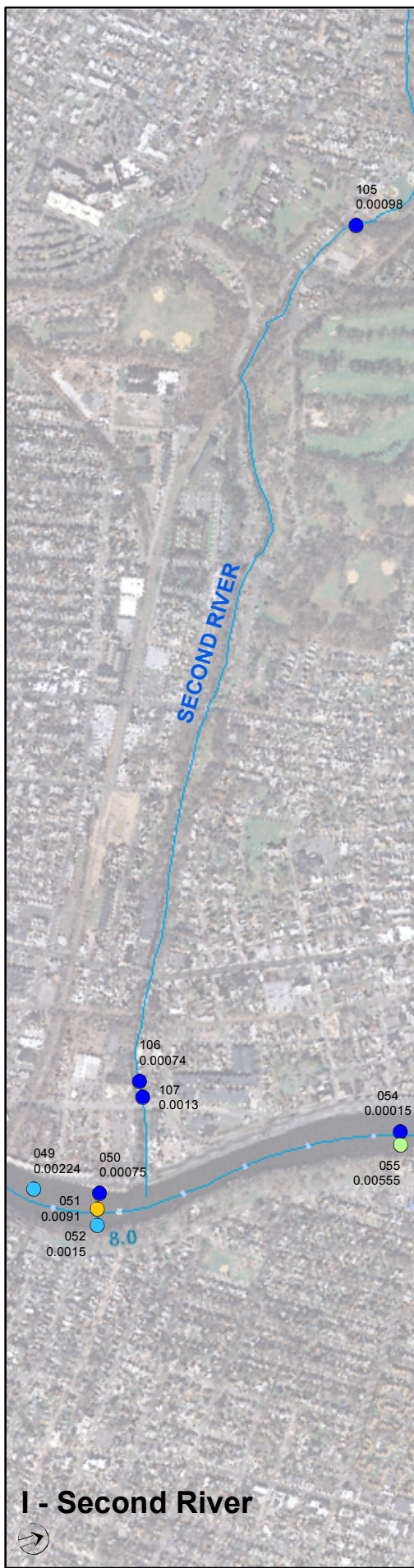
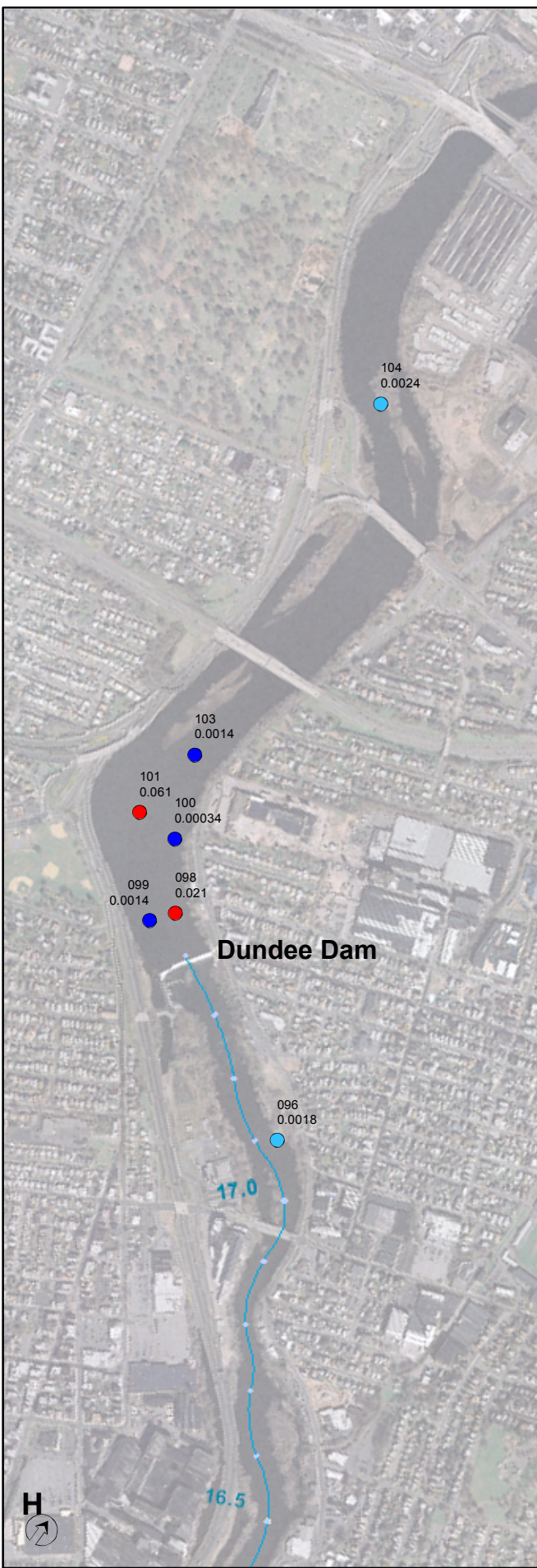


Figure 3-3.g 2008 LRC Surficial Analyte Concentration: Dieldrin (mg/kg)
0 - 0.5 ft
(Page 2 of 2)

0 500 1,000 2,000 Feet

• ≤ 0.0014

• >0.0014 - ≤ 0.0034

• >0.0034 - ≤ 0.0071

• >0.0071 - ≤ 0.0170

• > 0.0170

022 Location Code
59.4 Concentration

— Passaic River Centerline (miles)

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

AECOM
May 2011



J:\Water\ProjectFiles\PI\2012\12162_PassaicData\Summaries\Plans and Reports\2008\RC_Revisions\Figures\3-3_surface_maps\Chlordane_1_REV_May.mxd

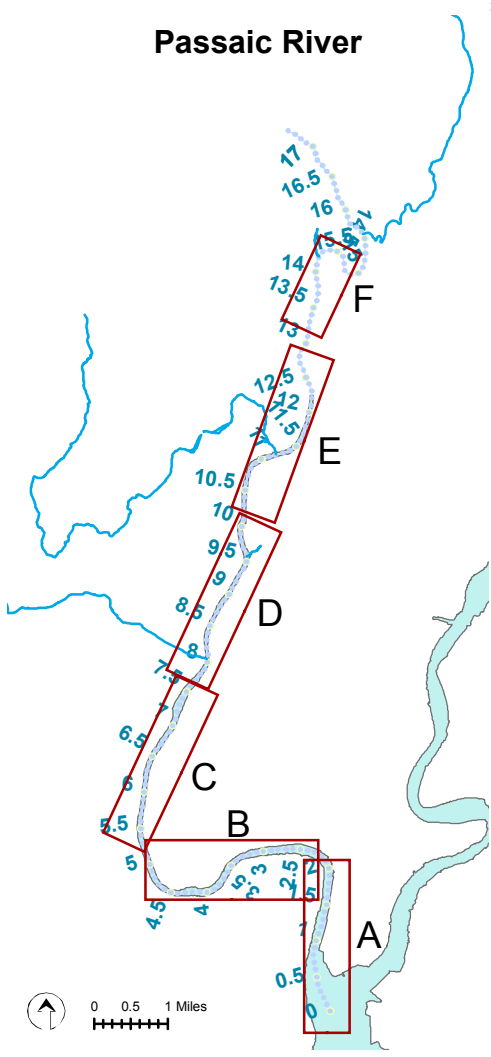
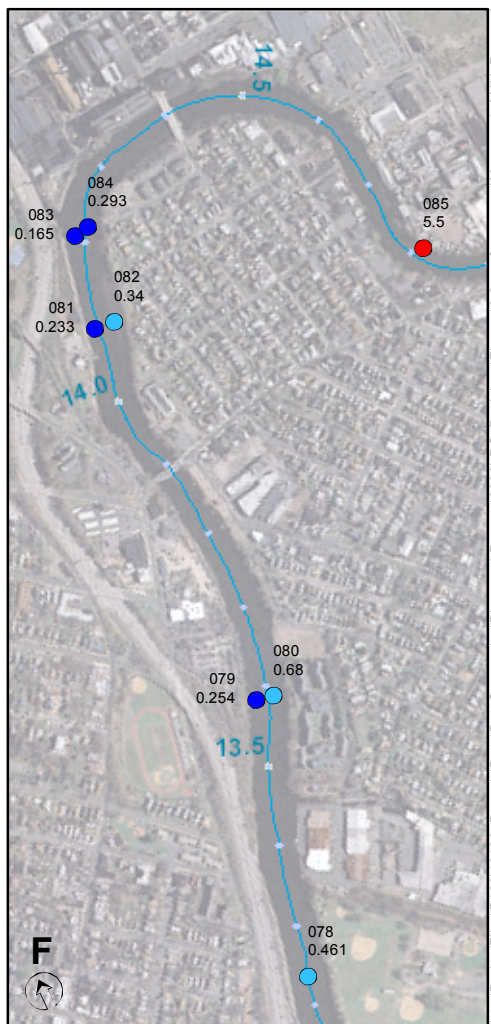
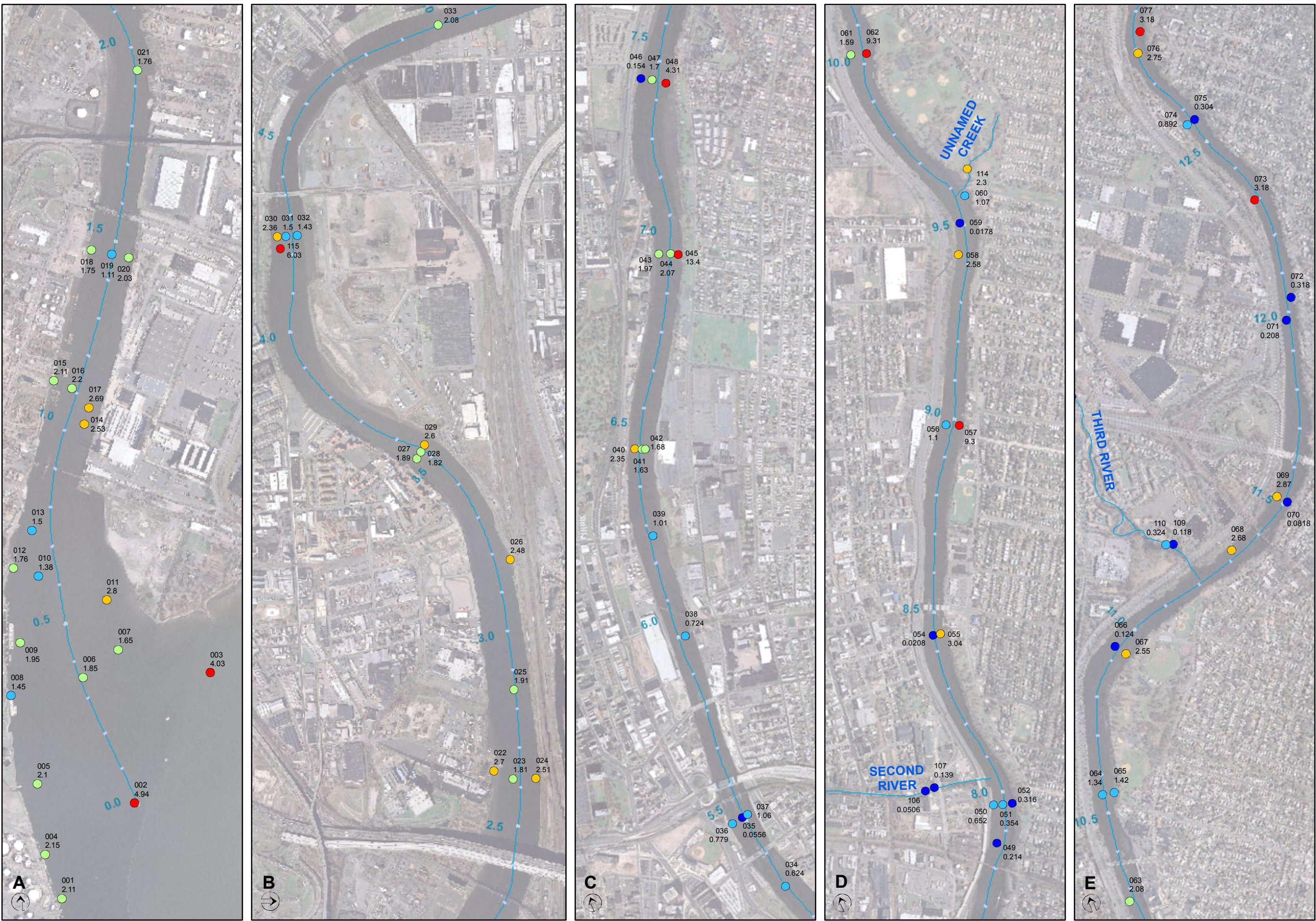


Figure 3-3.i 2008 LRC Surficial Analyte Concentration: Mercury (mg/kg)
0 - 0.5 ft
(Page 1 of 2)

<= 0.323

>0.323 - <= 1.50

>1.50 - <= 2.23

>2.23 - <= 3.08

>3.08

022

Location Code

59.4

Concentration

Passaic River Centerline (miles)

May 2011

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

J:\Water\ProjectFiles\P12012162_PassaicData\SummaryPlans and Reports\2008 RC Revisions\Figures\Figures3-3_surface_maps\Mercury_1_MAY_Rev.mxd

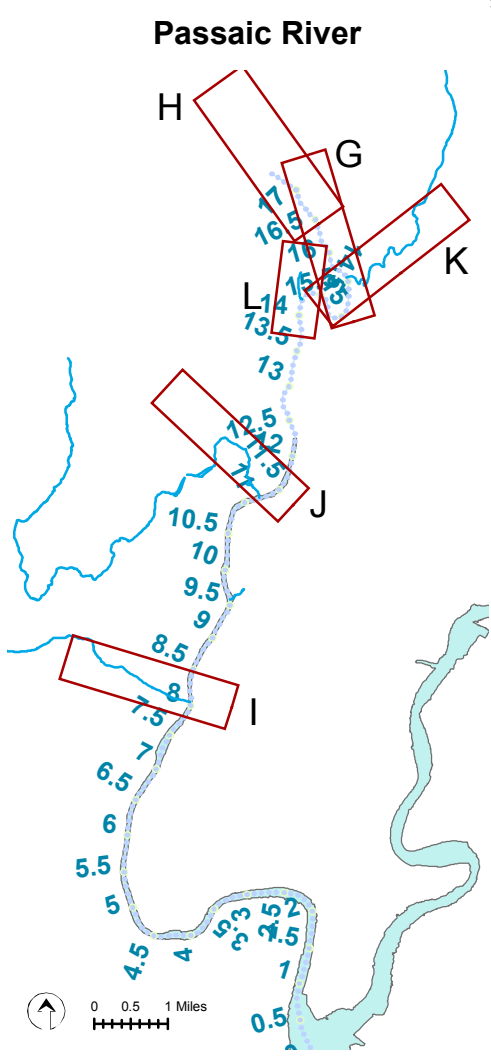
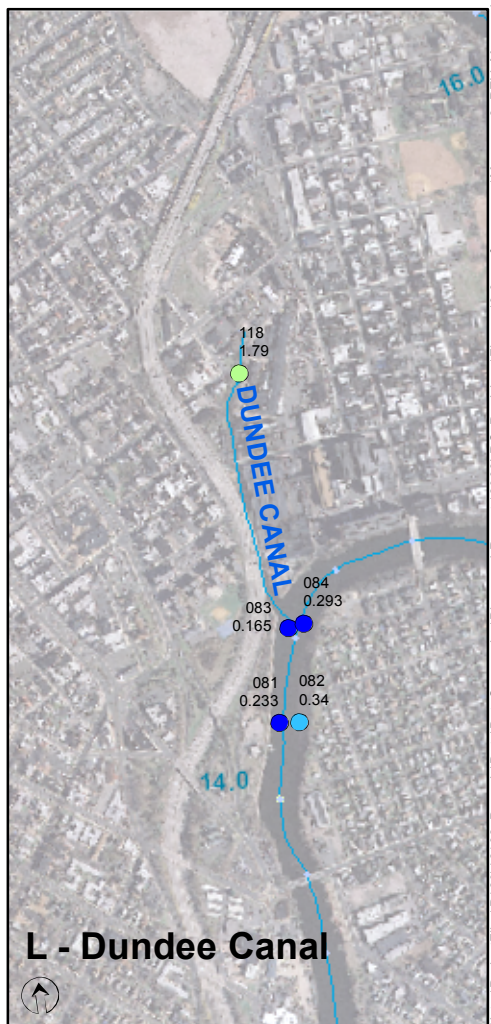
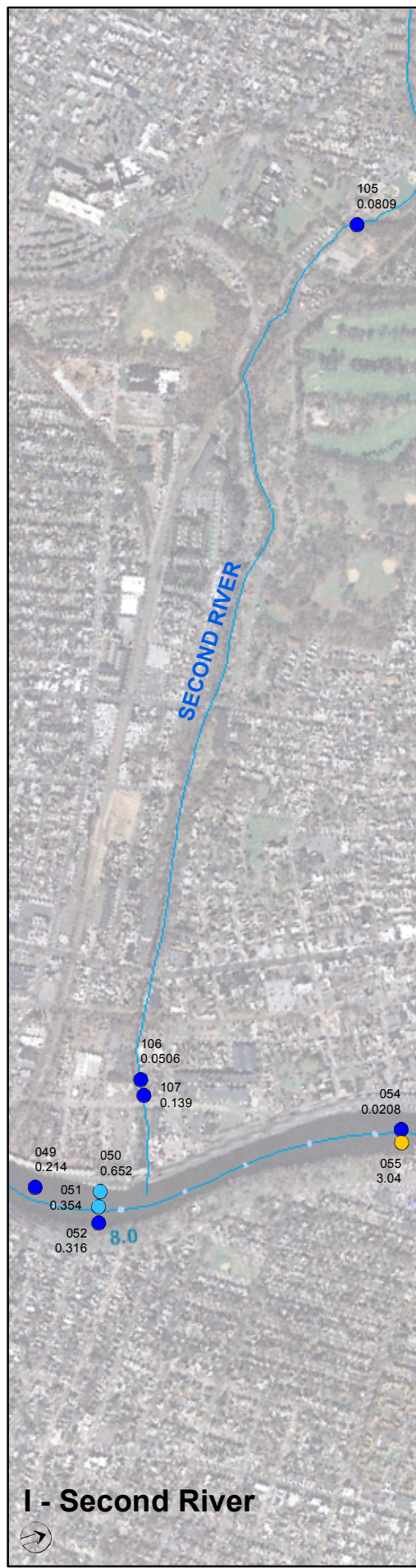
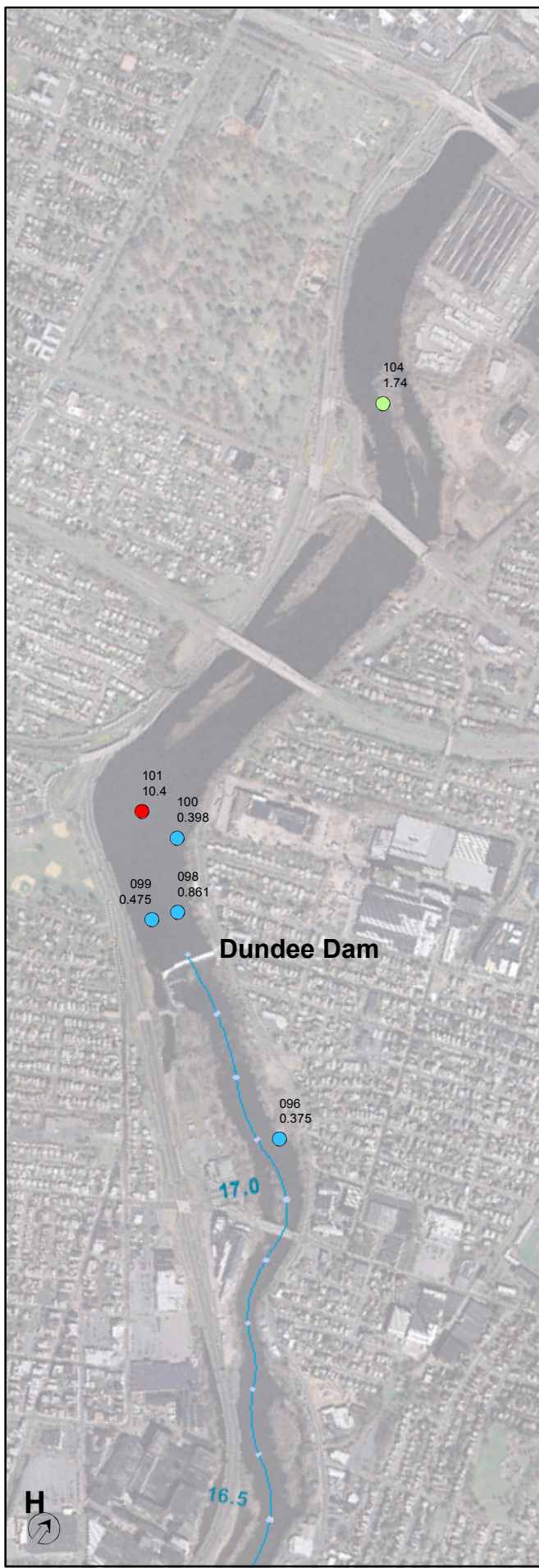


Figure 3-3.i 2008 LRC Surficial Analyte Concentration: Mercury (mg/kg)
0 - 0.5 ft
(Page 2 of 2)

● ≤ 0.323 ● >1.50 - ≤ 2.23 ● >3.08 — Passaic River Centerline (miles)
● >0.323 - ≤ 1.50 ● >2.23 - ≤ 3.08 022 Location Code
59.4 Concentration

AECOM
May 2011
Ortho: NJ Office of Information Technology (NJGIT), Office of
Geographic Information Systems (OGIS), 2007-2008

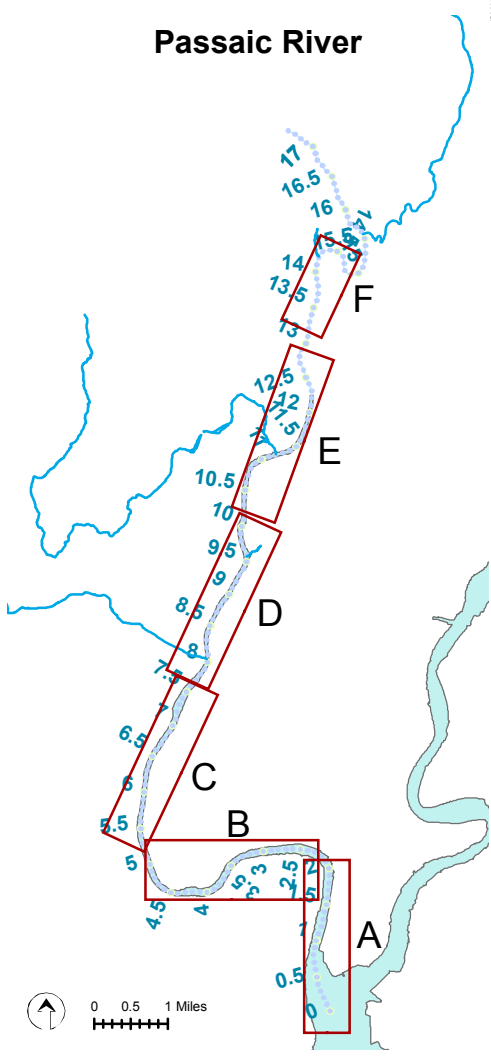
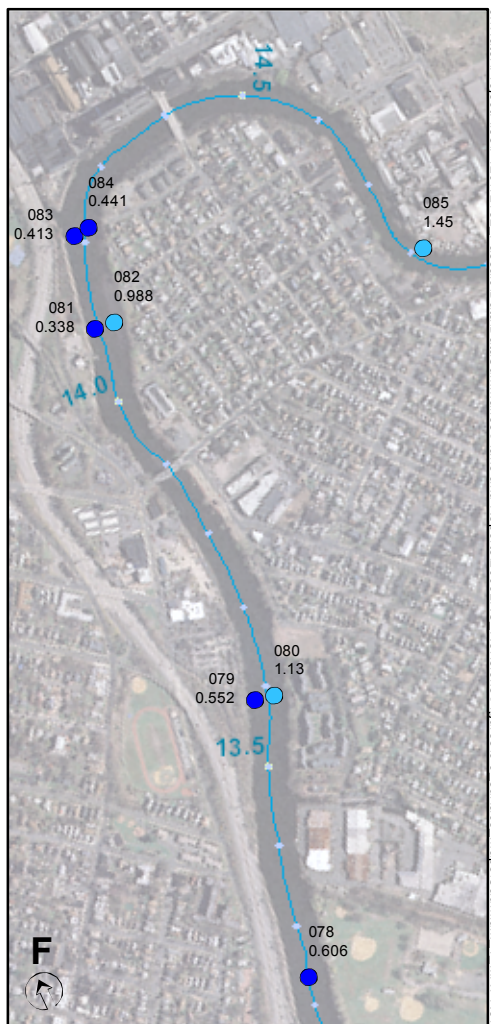
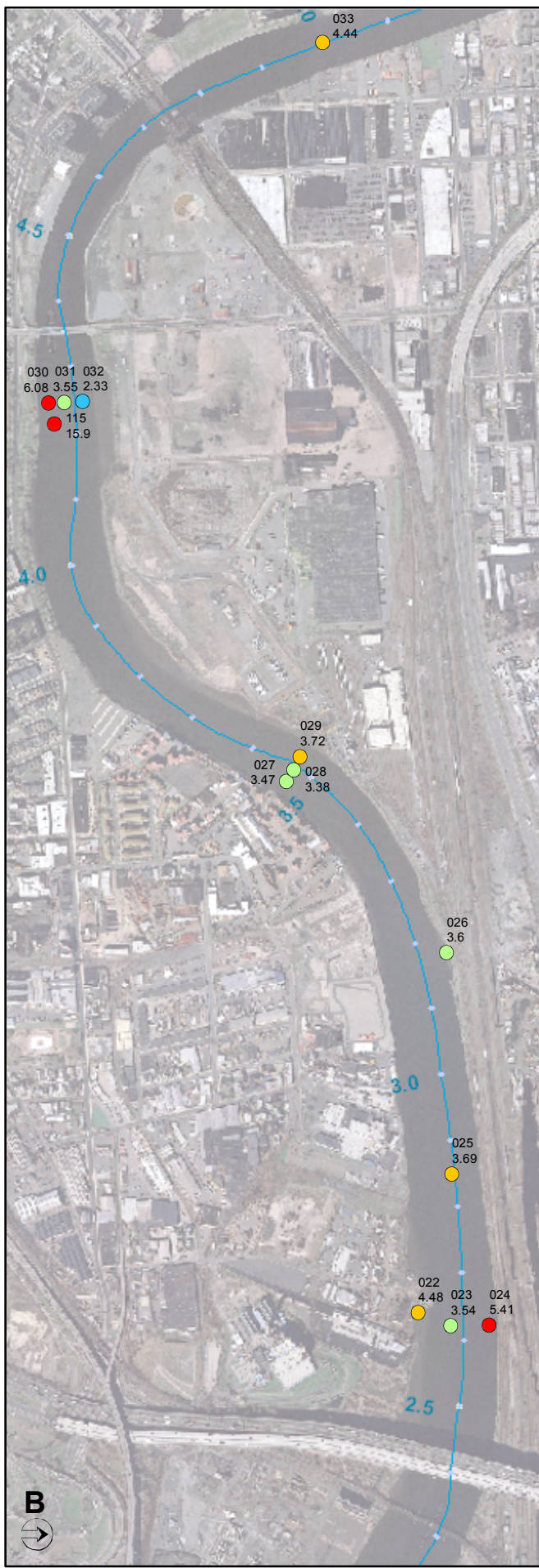
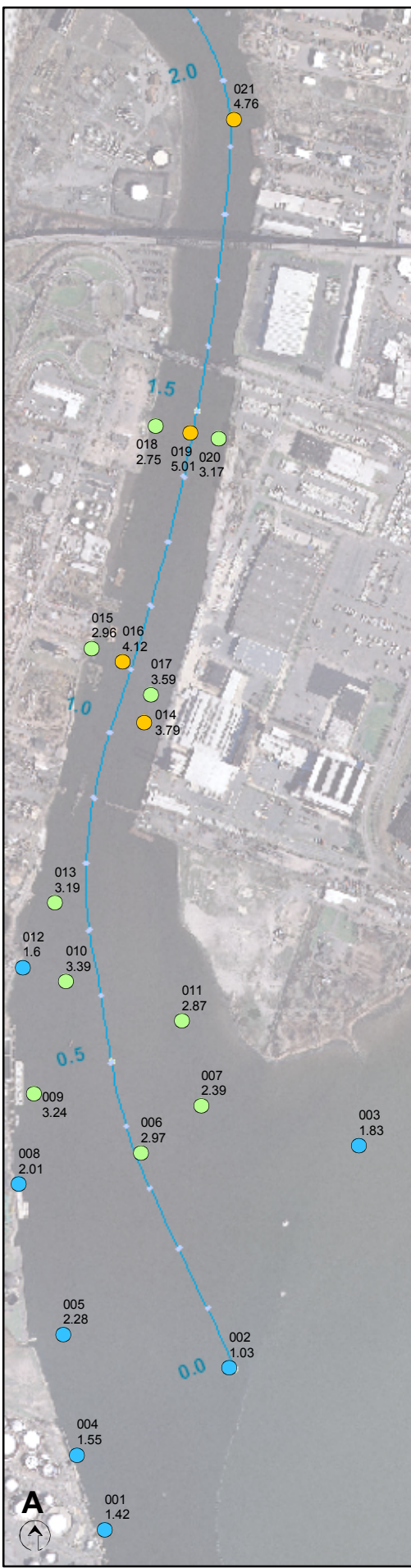


Figure 3-3.j 2008 LRC Surficial Analyte Concentration: Cadmium (mg/kg)
0 - 0.5 ft
(Page 1 of 2)

0 500 1,000 2,000 Feet

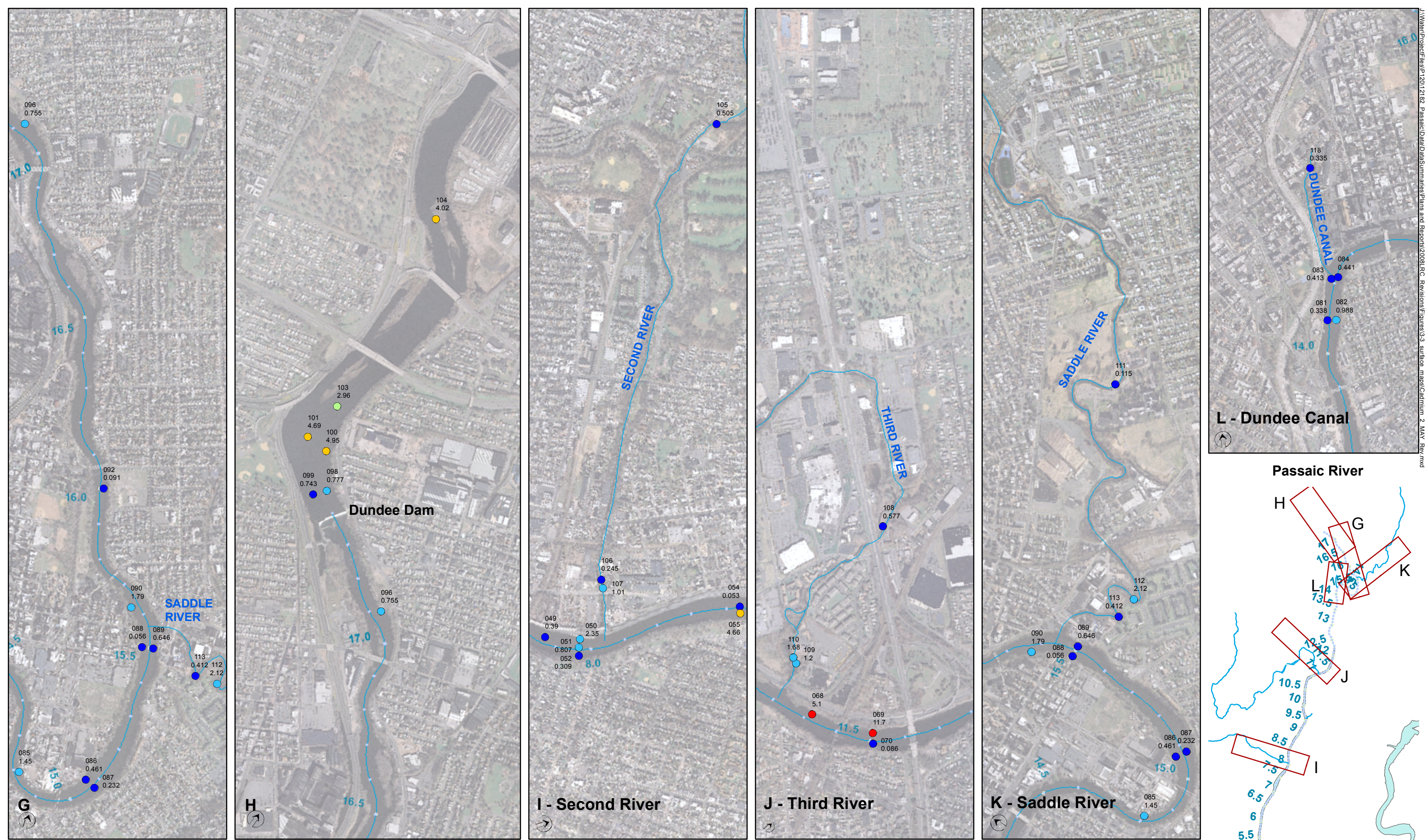
● ≤ 0.743 ● >2.35 - ≤3.60 ● > 5.03 — Passaic River Centerline (miles)
● >0.743 - ≤2.35 ● >3.60 - ≤5.03

022 Location Code
59.4 Concentration

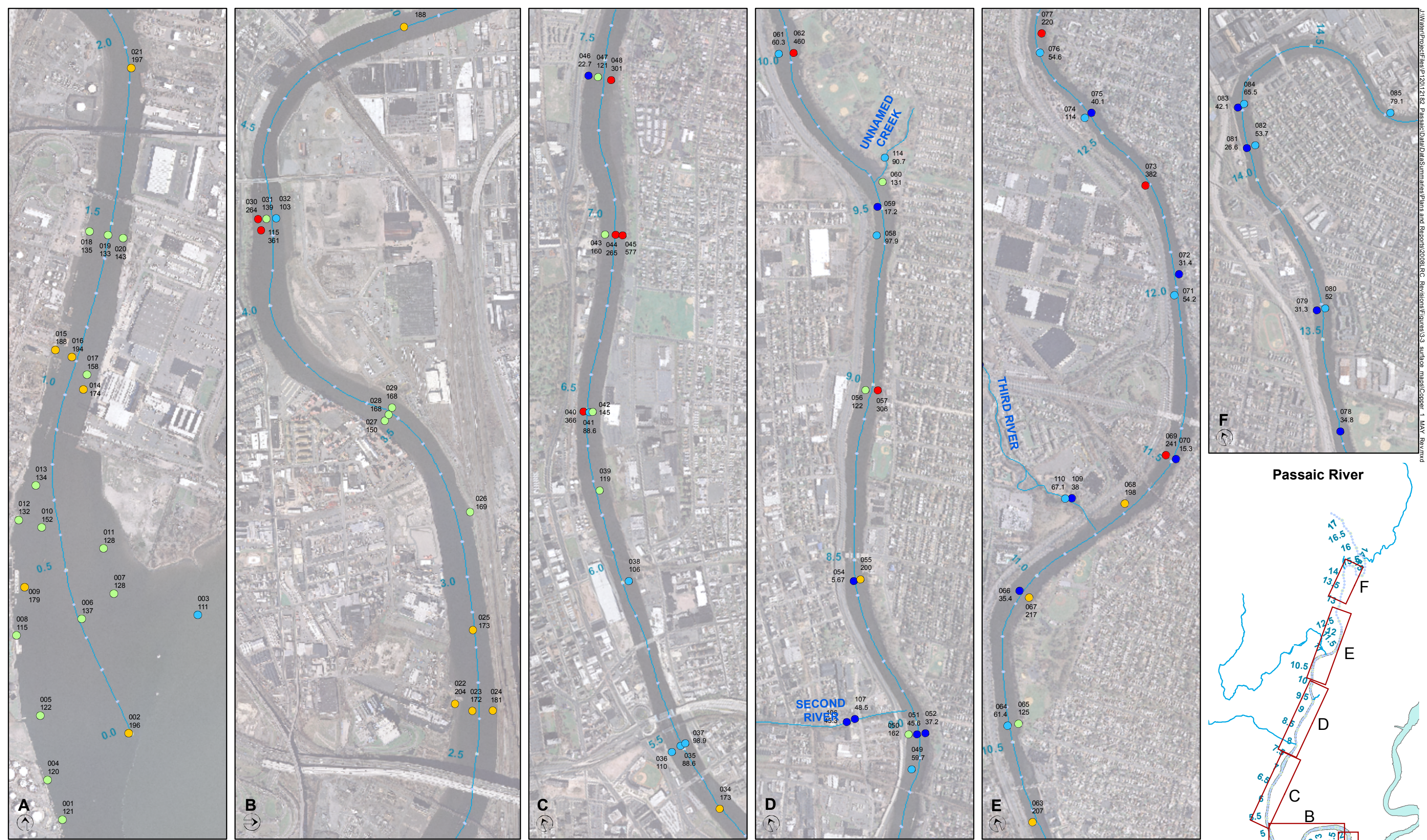
Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

AECOM
May 2011

0 0.5 1 Miles



J:\Water\Project\leap\12012182_PassaicData\Surficial\Plans and Reports\2008\RC_Revisions\Figures\3.3_surface_maps\Cadmiun 2 MAY Rev.mxd



J:\Water\Projects\leap1201\2182_PassaicData\Summaries\Plans and Reports\2008\LC_Revisions\Figures\3-3_surface_maps\Copper_1_MAY_Revised.mxd

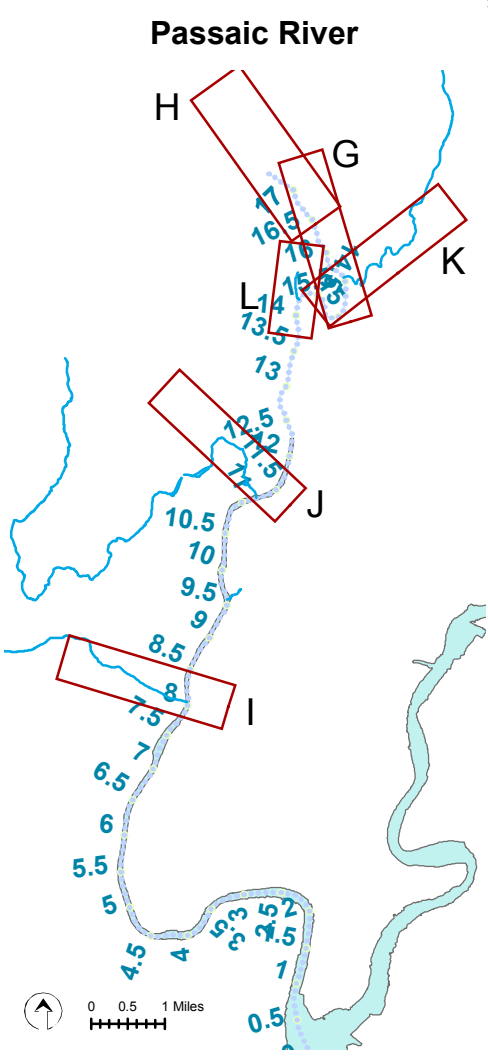
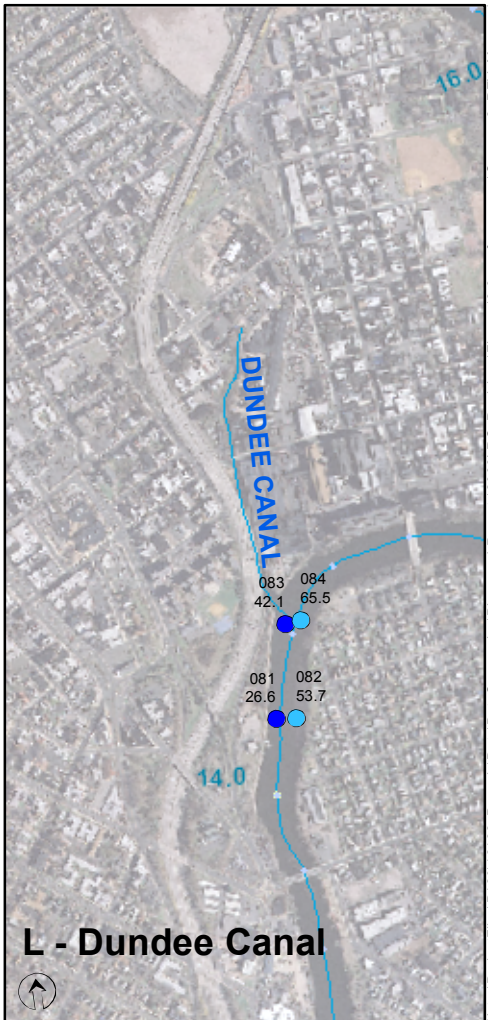
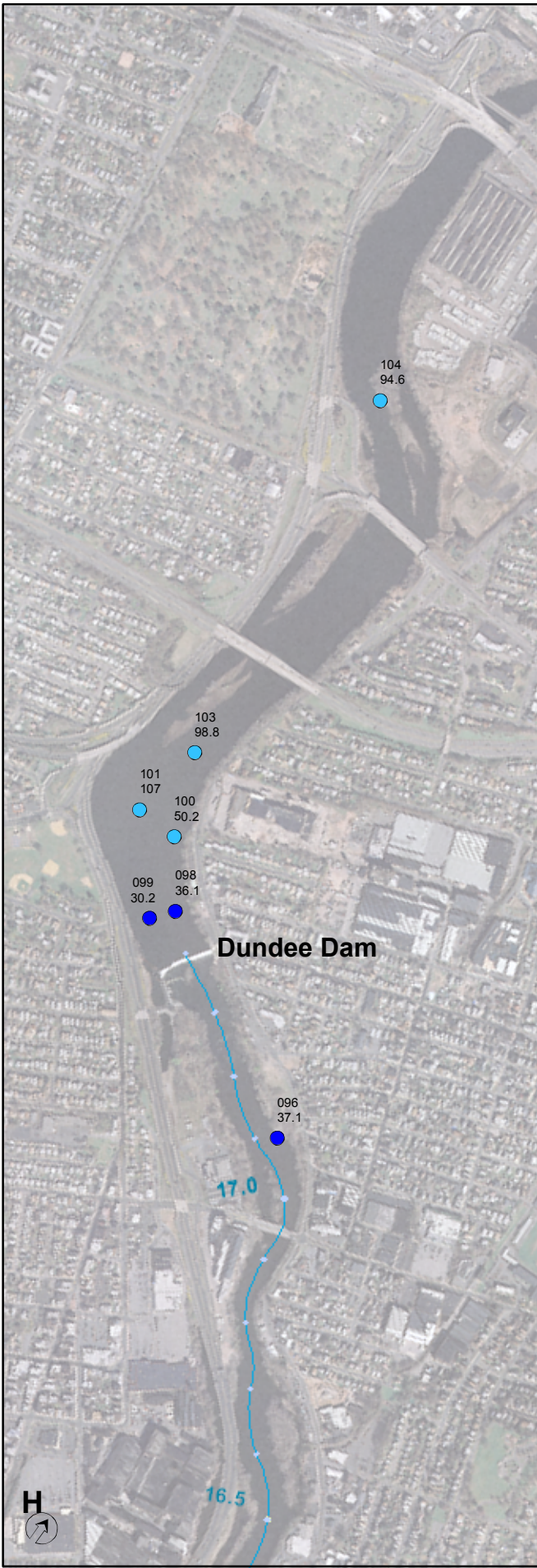


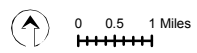
Figure 3-3.k 2008 LRC Surficial Analyte Concentration: Copper (mg/kg)
0 - 0.5 ft
(Page 2 of 2)



022 Location Code
 59.4 Concentration

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

AECOM
 May 2011



J:\Water\Project\Files\PT120112162_Passaic\Data\Summary\Plans and Reports\2008\LRC_Revisions\Figures\Figures3-3_surface_maps\Copper_2_REV_May.mxd

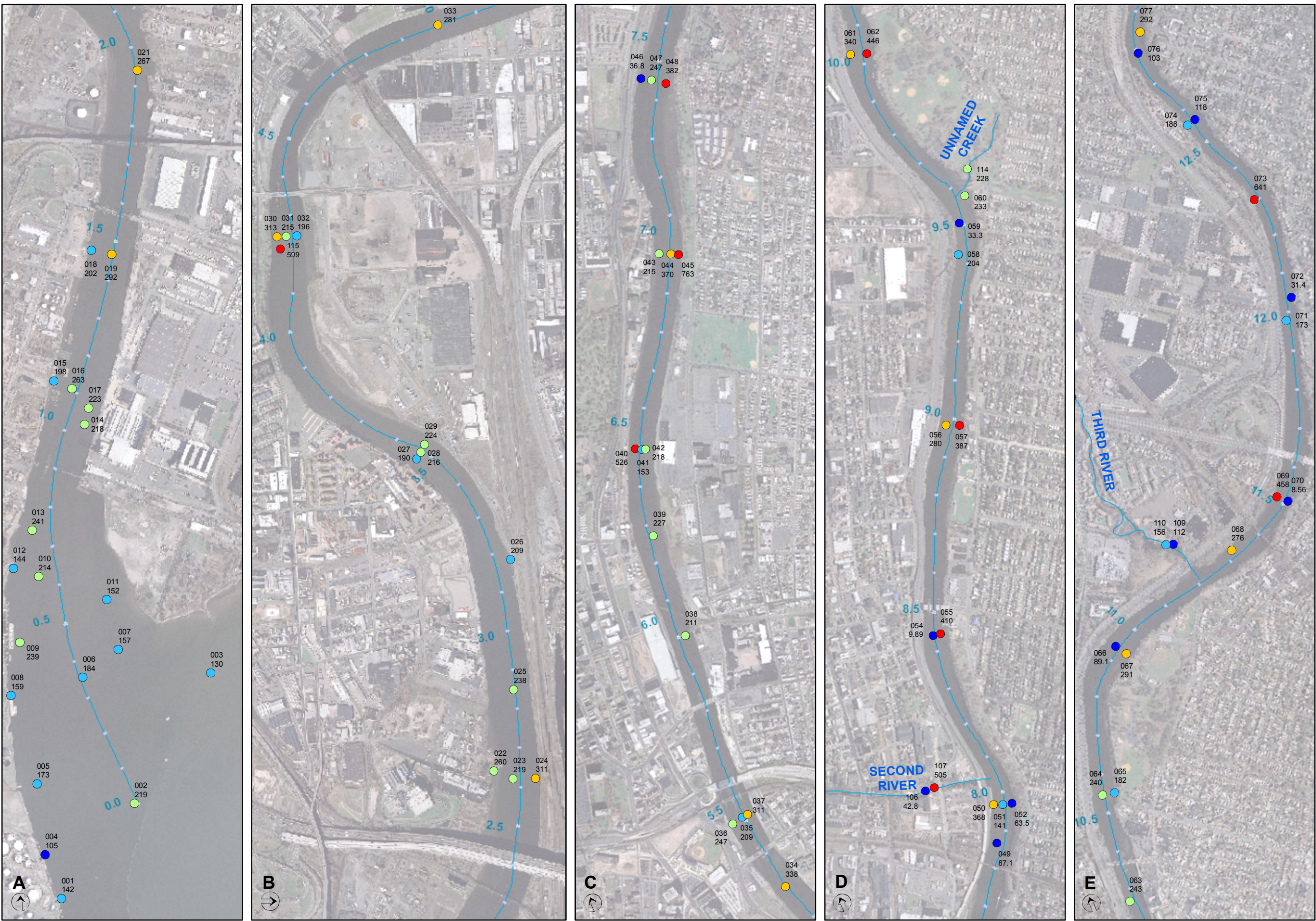


Figure 3-3.I 2008 LRC Surficial Analyte Concentration: Lead (mg/kg)
0 - 0.5 ft
(Page 1 of 2)

● ≤ 118 ● >209 - ≤263
● >118 - ≤209 ● >263 - ≤377

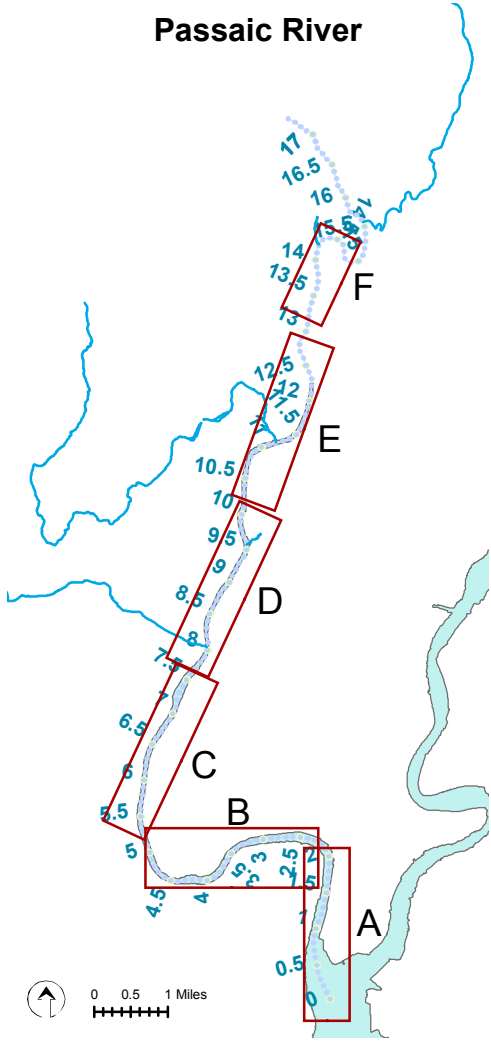
0 500 1,000 2,000 Feet

● 022 Location Code
59.4 Concentration

● Passaic River Centerline (miles)

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

AECOM
May 2011



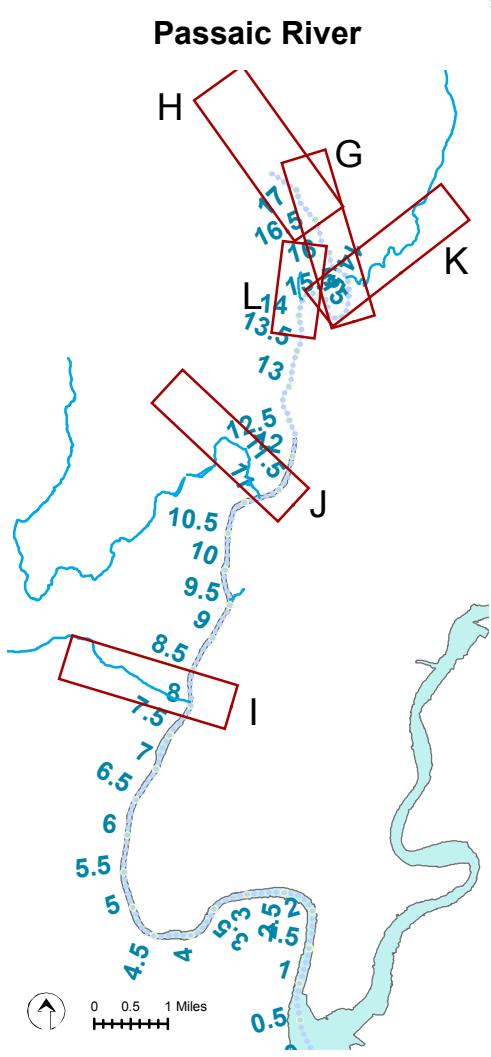
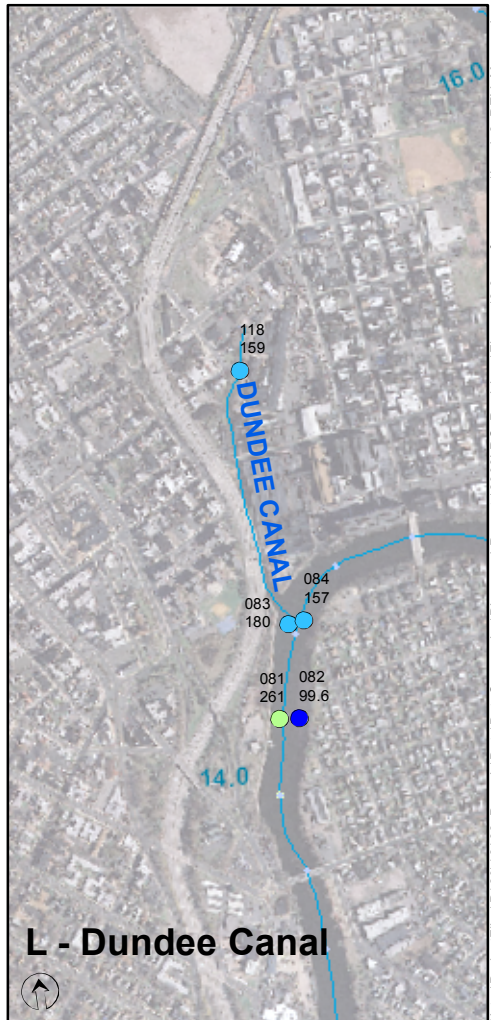
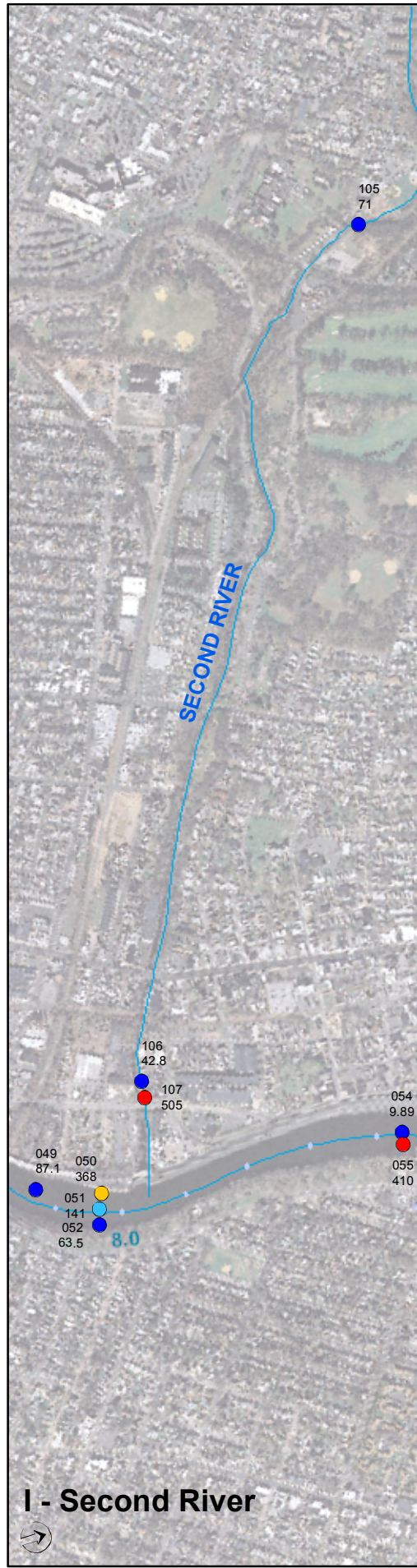
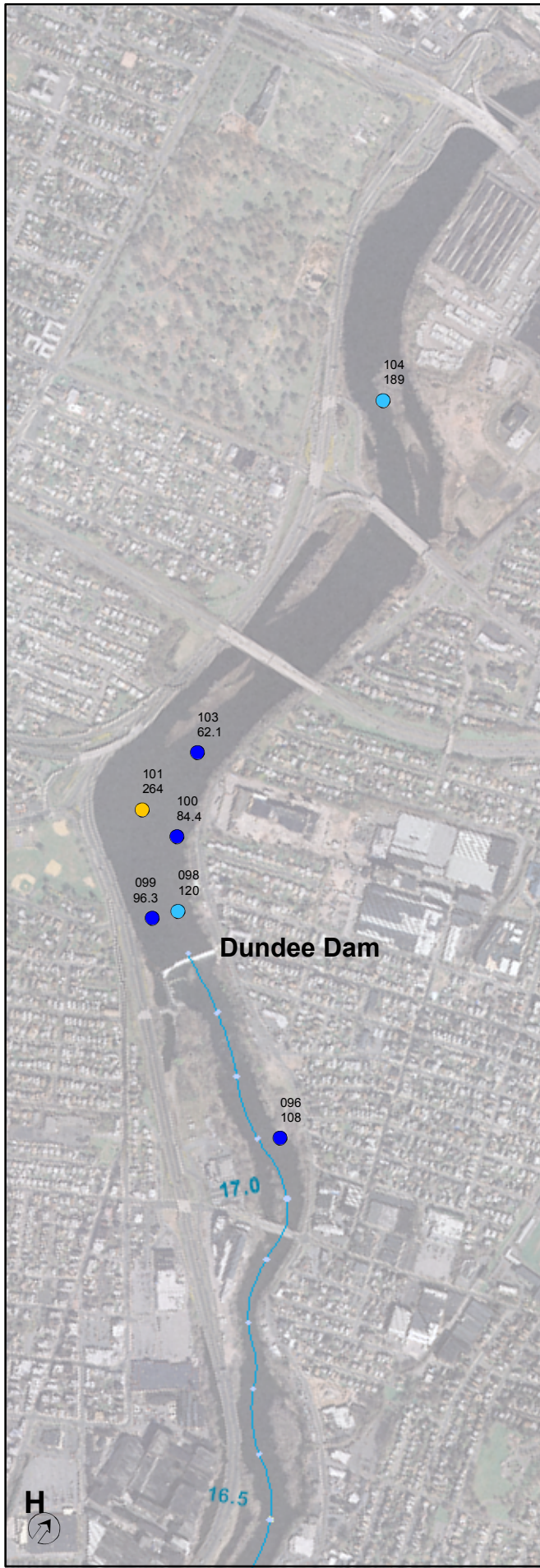


Figure 3-3.I 2008 LRC Surficial Analyte Concentration:Lead (mg/kg)
0 - 0.5 ft
(Page 2 of 2)

● ≤ 118

● >118 - ≤209

● >209 - ≤263

● >263 - ≤377

● >377

● 022

● 59.4

● Location Code

● Concentration

— Passaic River Centerline (miles)

AECOM

May 2011

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

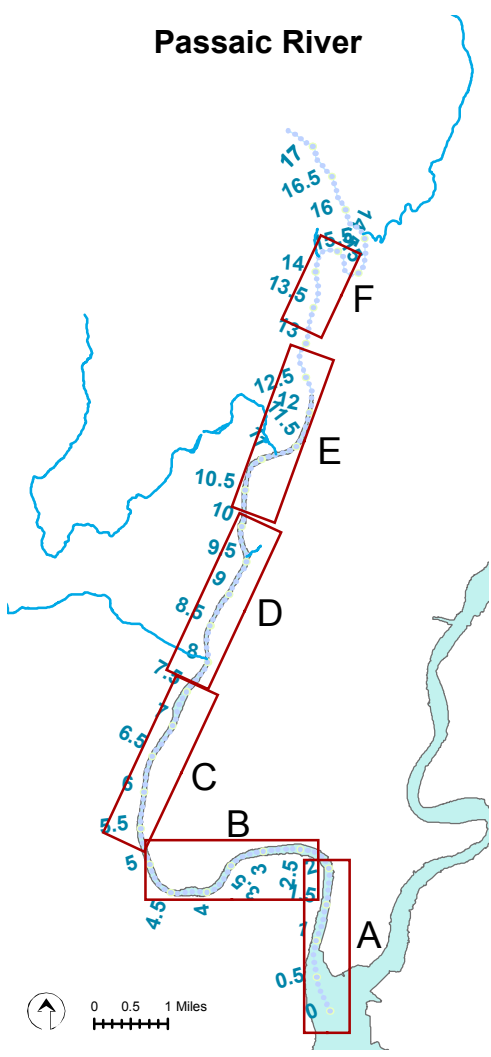
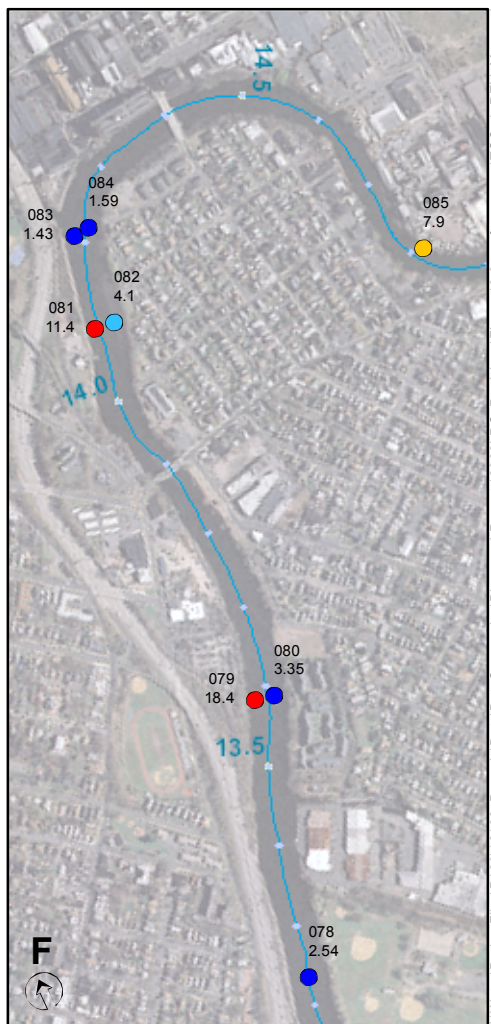
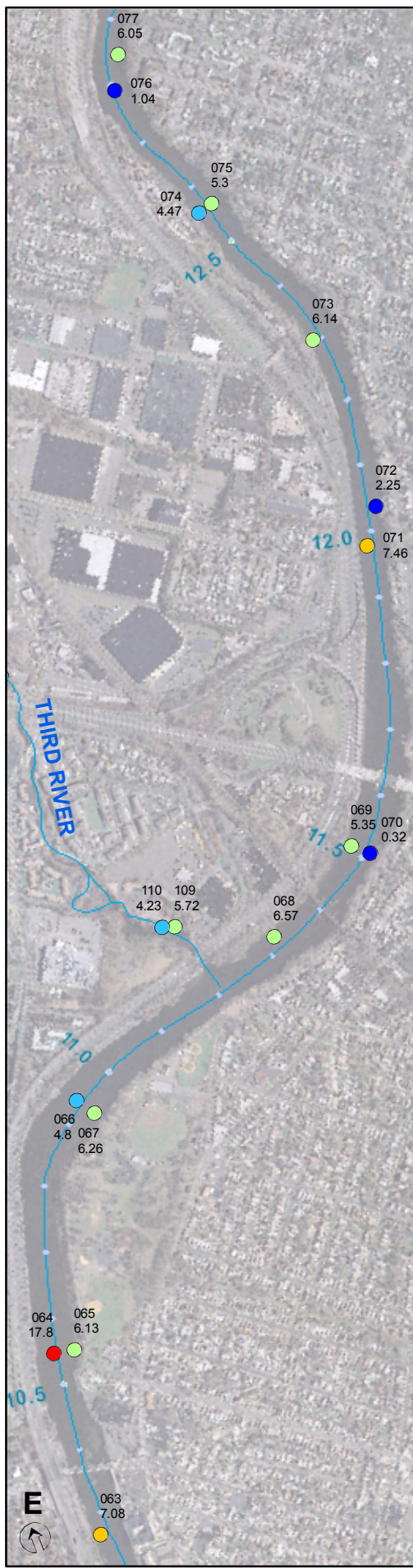
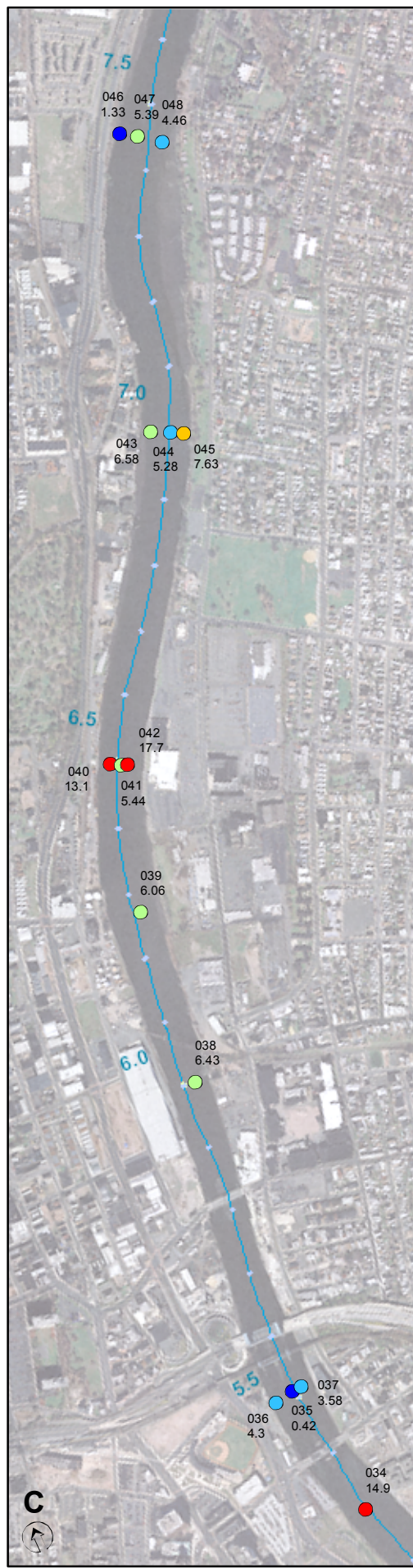
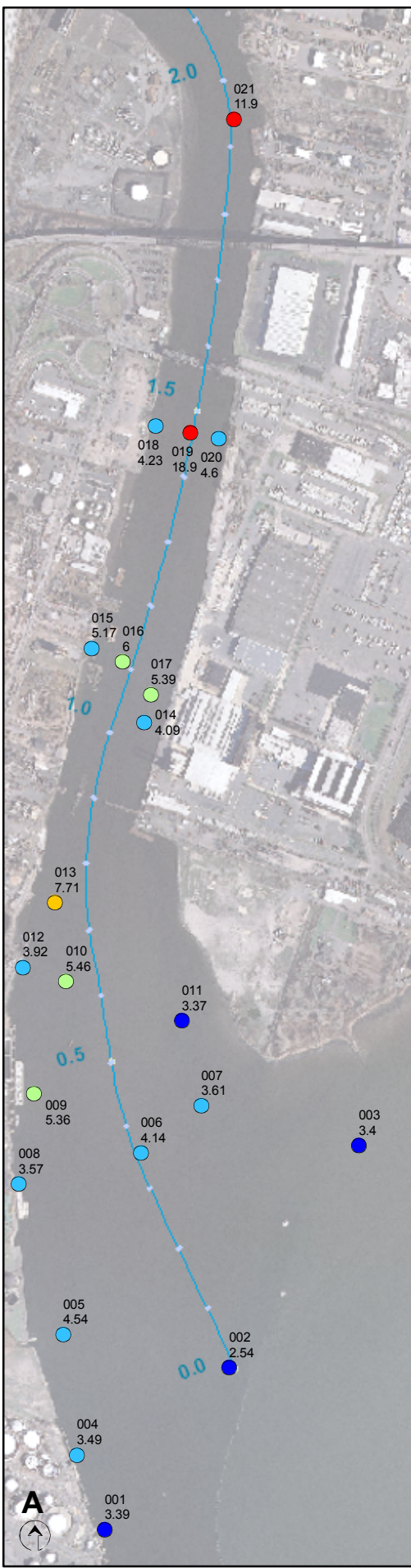


Figure 3-3.m 2008 LRC Surficial Analyte Concentration: TOC (%)
0 - 0.5 ft
(Page 1 of 2)

<= 3.4%

>3.4% - <=5.28%

>5.28% - <=6.58%

>6.58% - <=10.36%

> 10.36%

022

59.4

Location Code

Concentration

Passaic River Centerline (miles)

AECOM

May 2011

Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008

J:\WaterProjectFiles\12012182_PassaicData\SurfaceData\Summaries\Plans and Reports\2008LRC_Revisions\Figures\3-3_surface_maps\TOC_1_REV_May.mxd

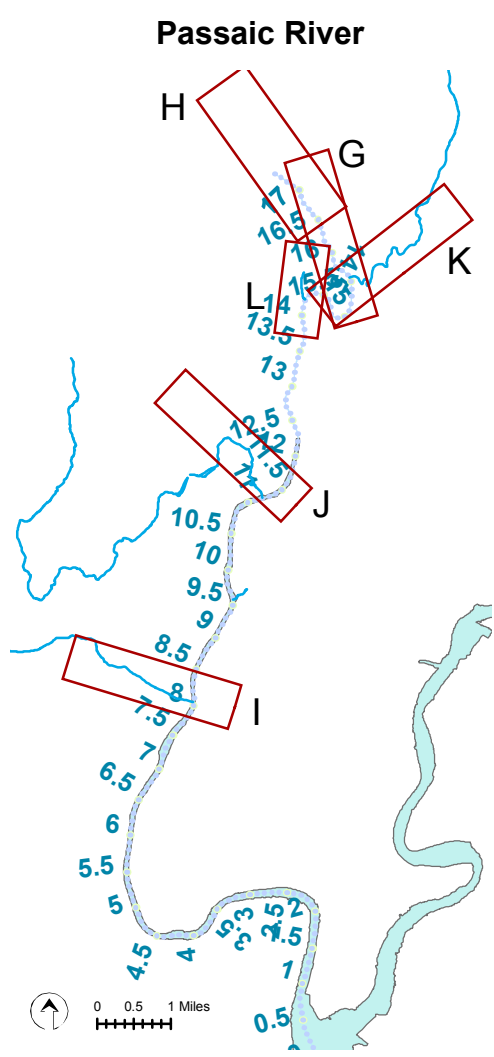
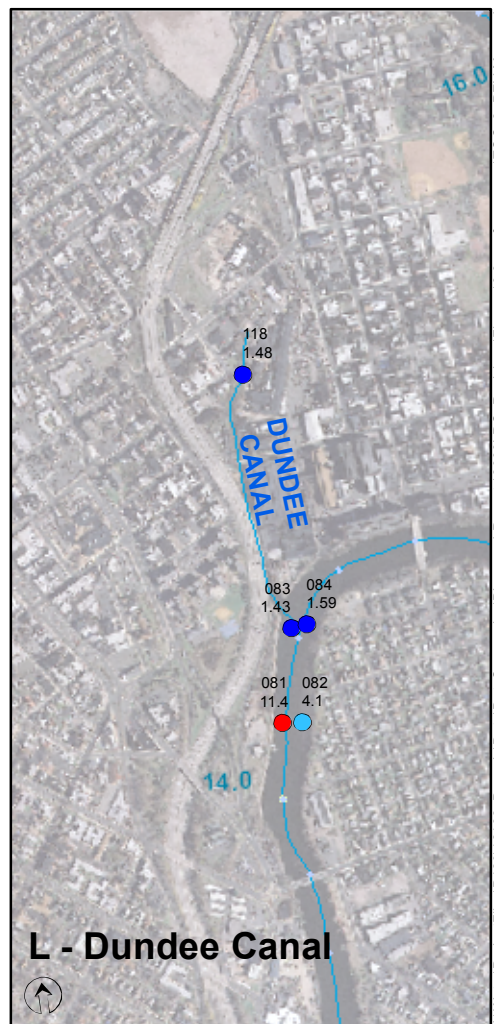
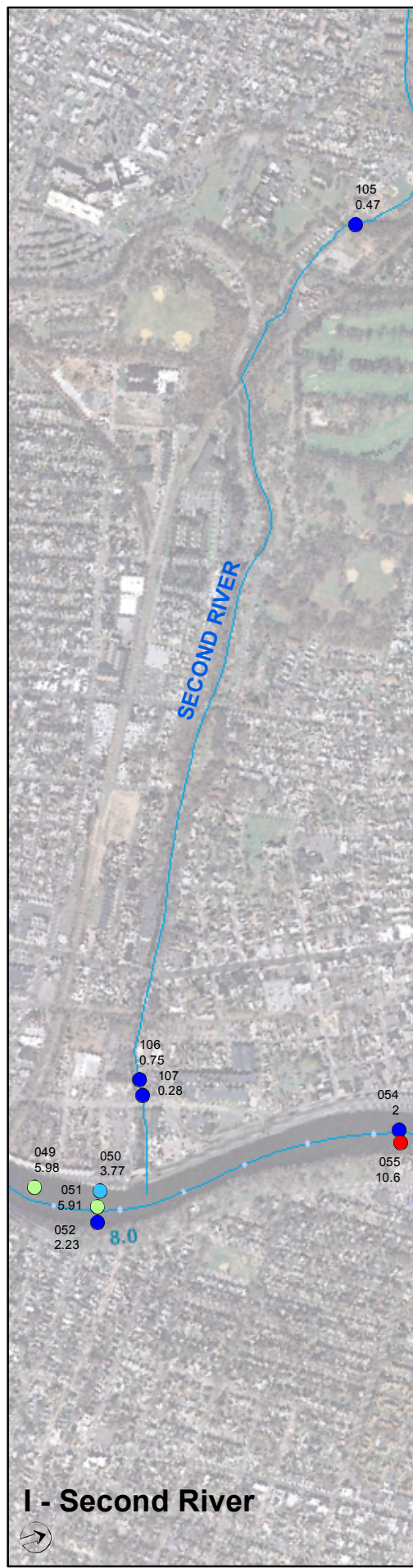
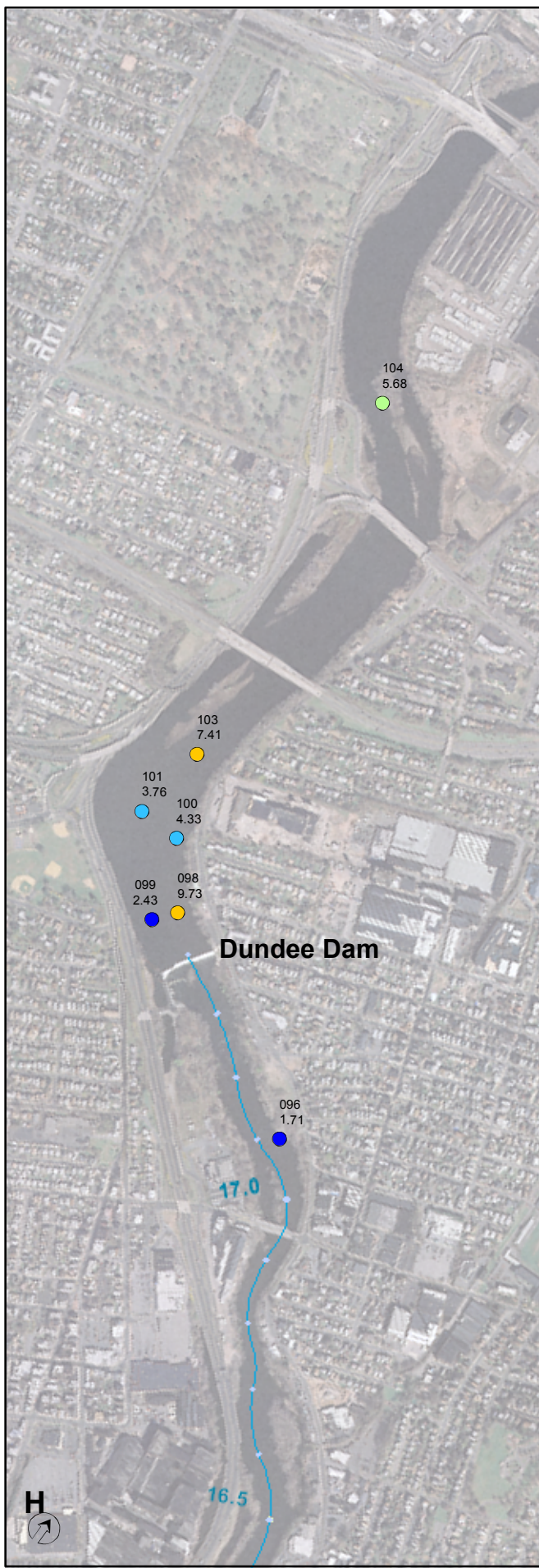
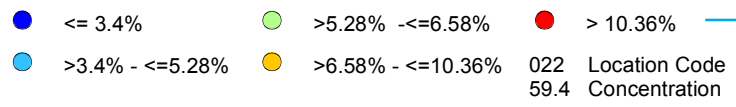
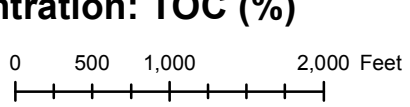


Figure 3-3.m 2008 LRC Surficial Analyte Concentration: TOC (%)
0 - 0.5 ft
(Page 2 of 2)



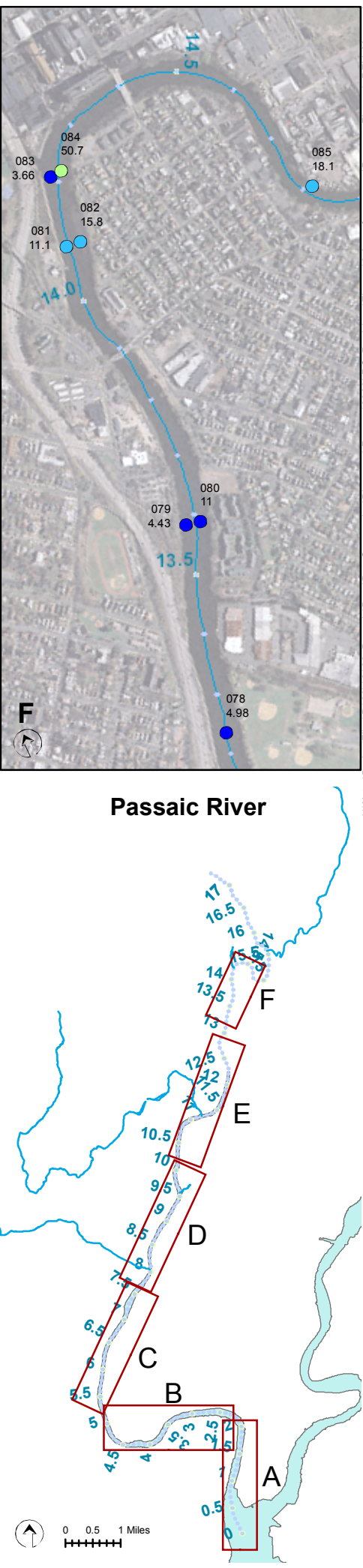
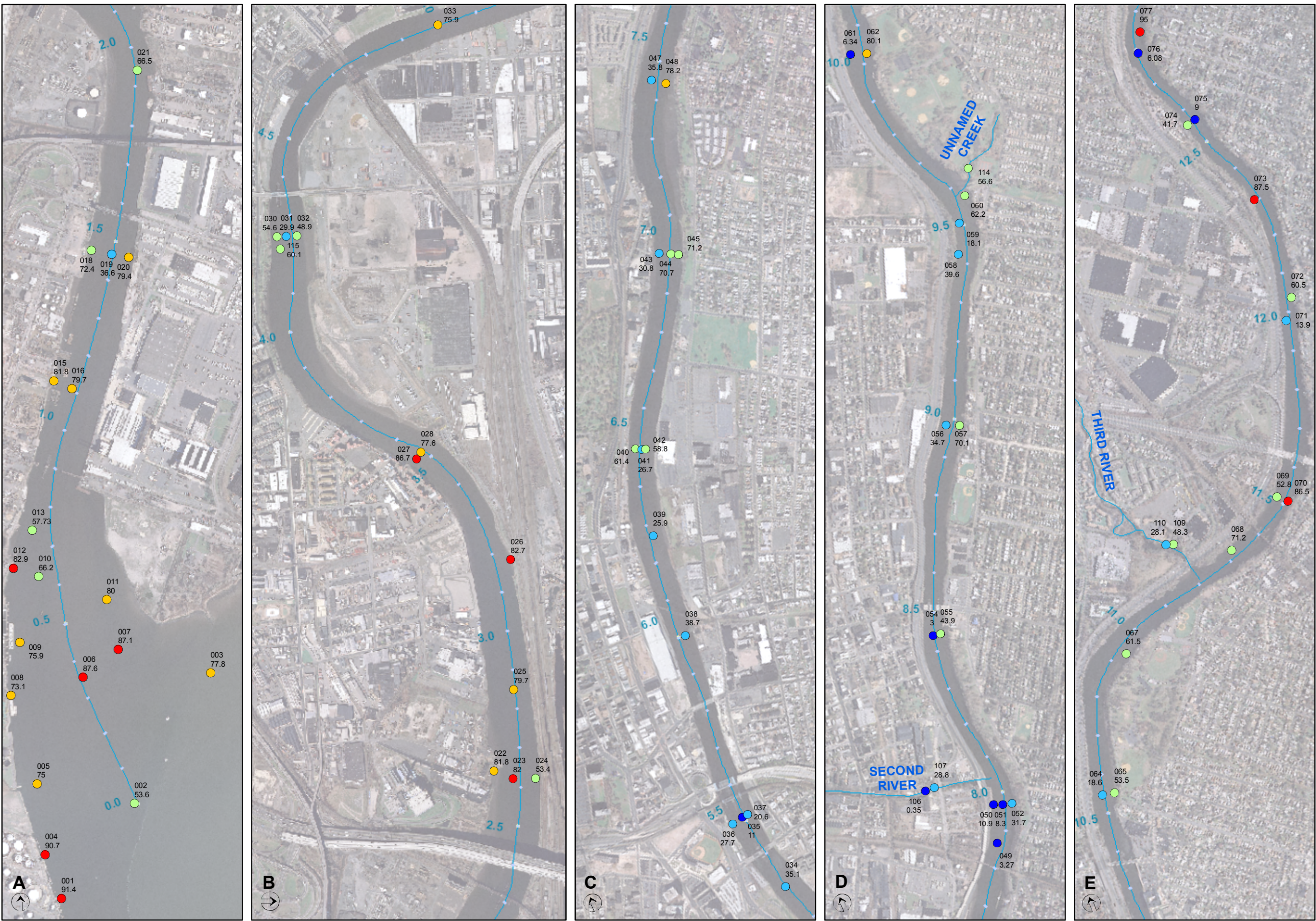


Figure 3-3.n 2008 LRC Surficial Analyte Concentration: Percent Fines (%)
0 - 0.5 ft
(Page 1 of 2)

● ≤ 11.00% ● >39.60% - ≤ 72.75% ● >81.96% — Passaic River Centerline (miles)
● >11.00% - ≤ 39.60% ● >72.75% - ≤ 81.96%

022 Location Code
59.4 Concentration
Ortho: NJ Office of Information Technology (NJGIT), Office of Geographic Information Systems (OGIS), 2007-2008e

AECOM
May 2011

0 0.5 1 Miles

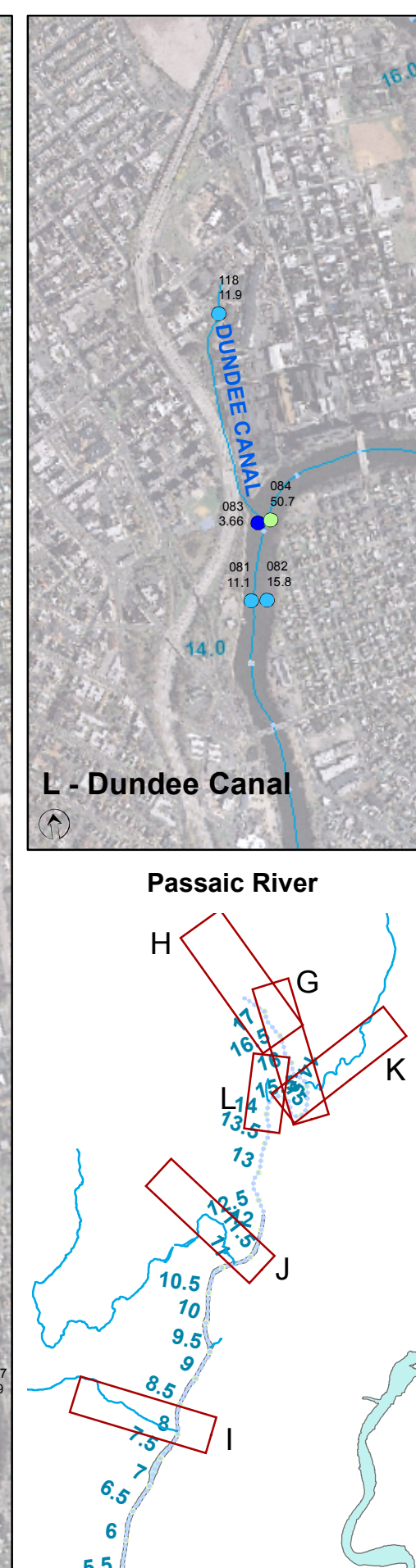
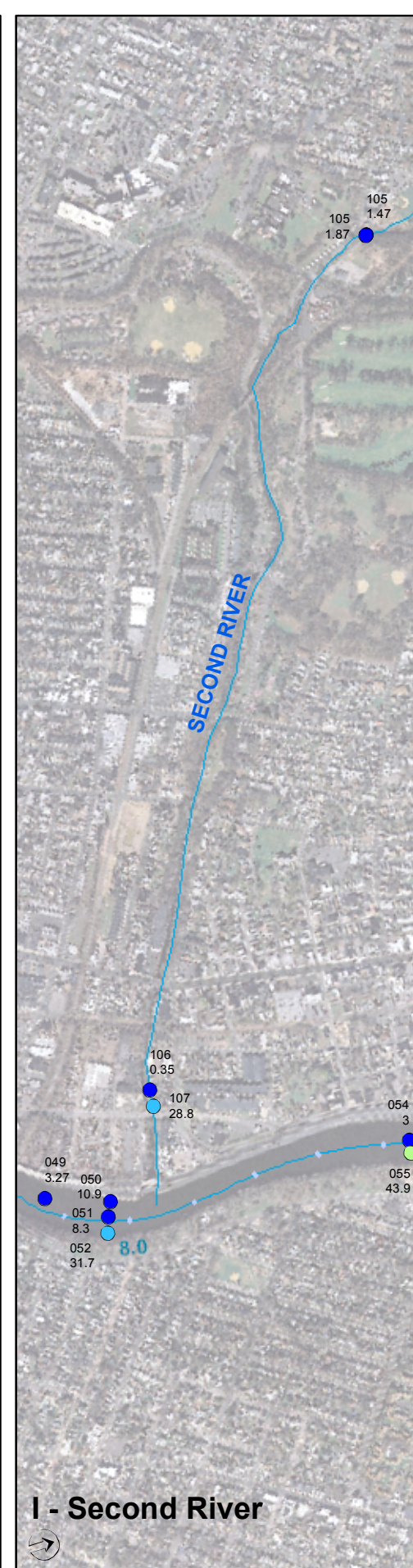
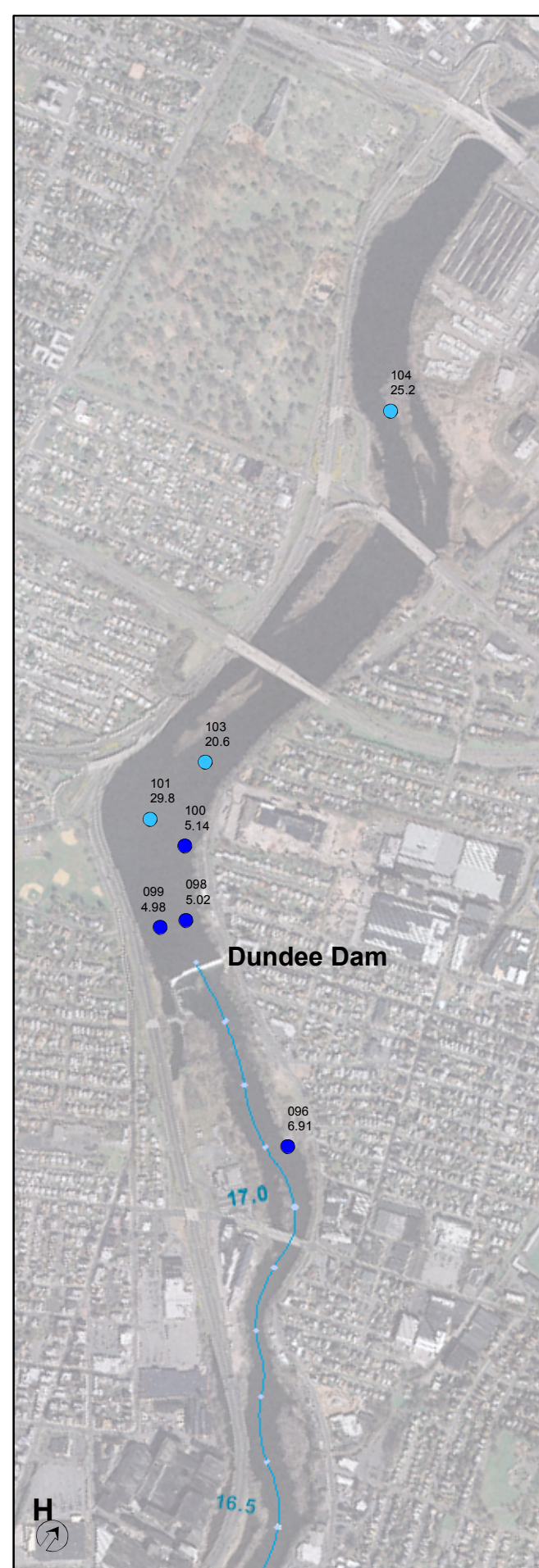
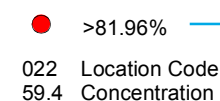
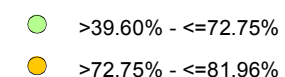
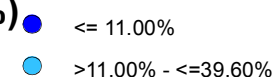
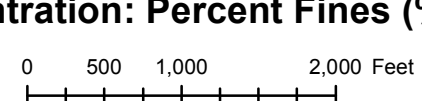


Figure 3-3.n 2008 LRC Surficial Analyte Concentration: Percent Fines (%)
0 - 0.5 ft
(Page 2 of 2)

0 500 1,000 2,000 Feet



May 2011

Ortho: NJ Office of Information Technology (NJ OIT), Office of
Geographic Information Systems (OGIS), 2007-2008

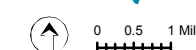
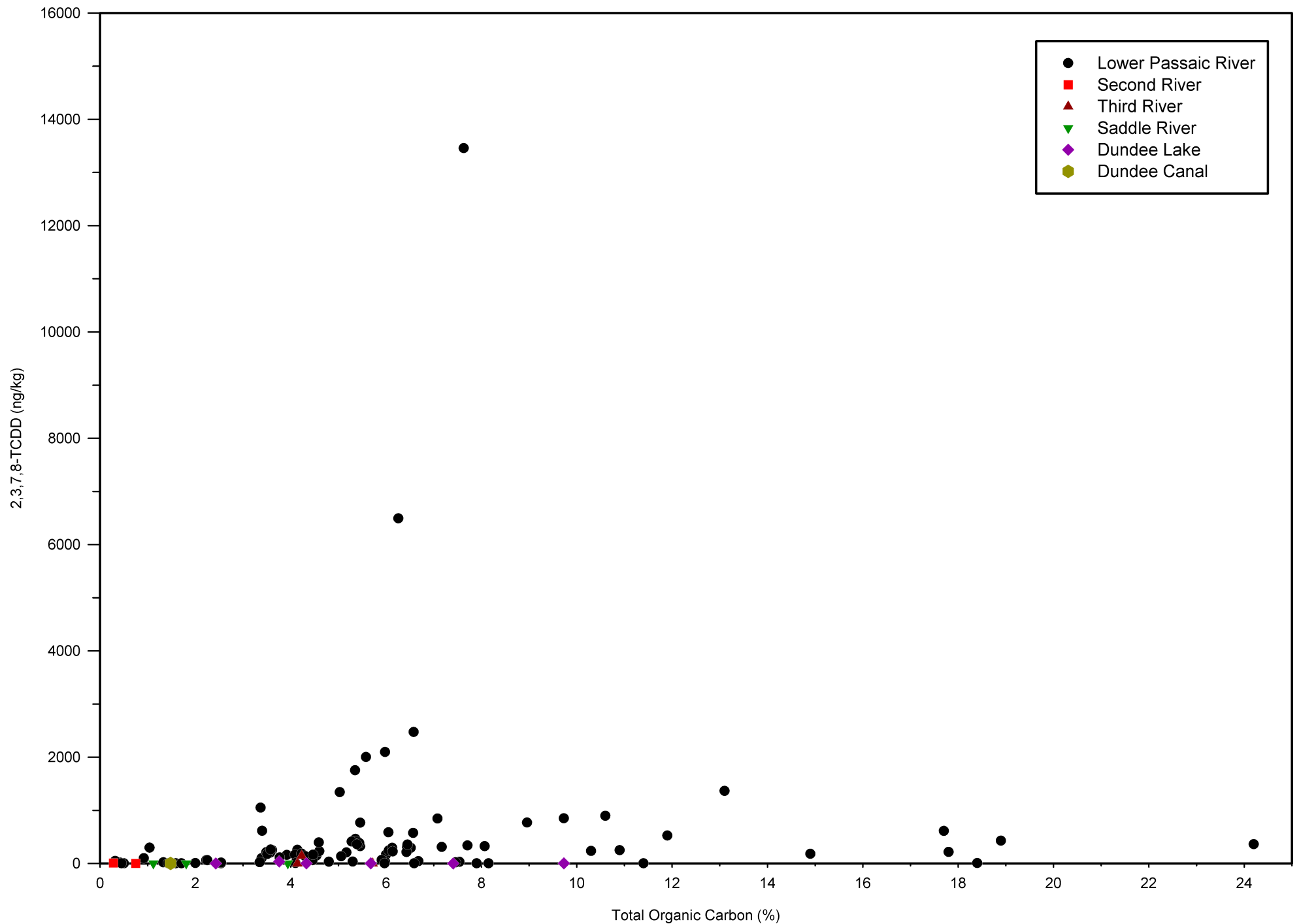
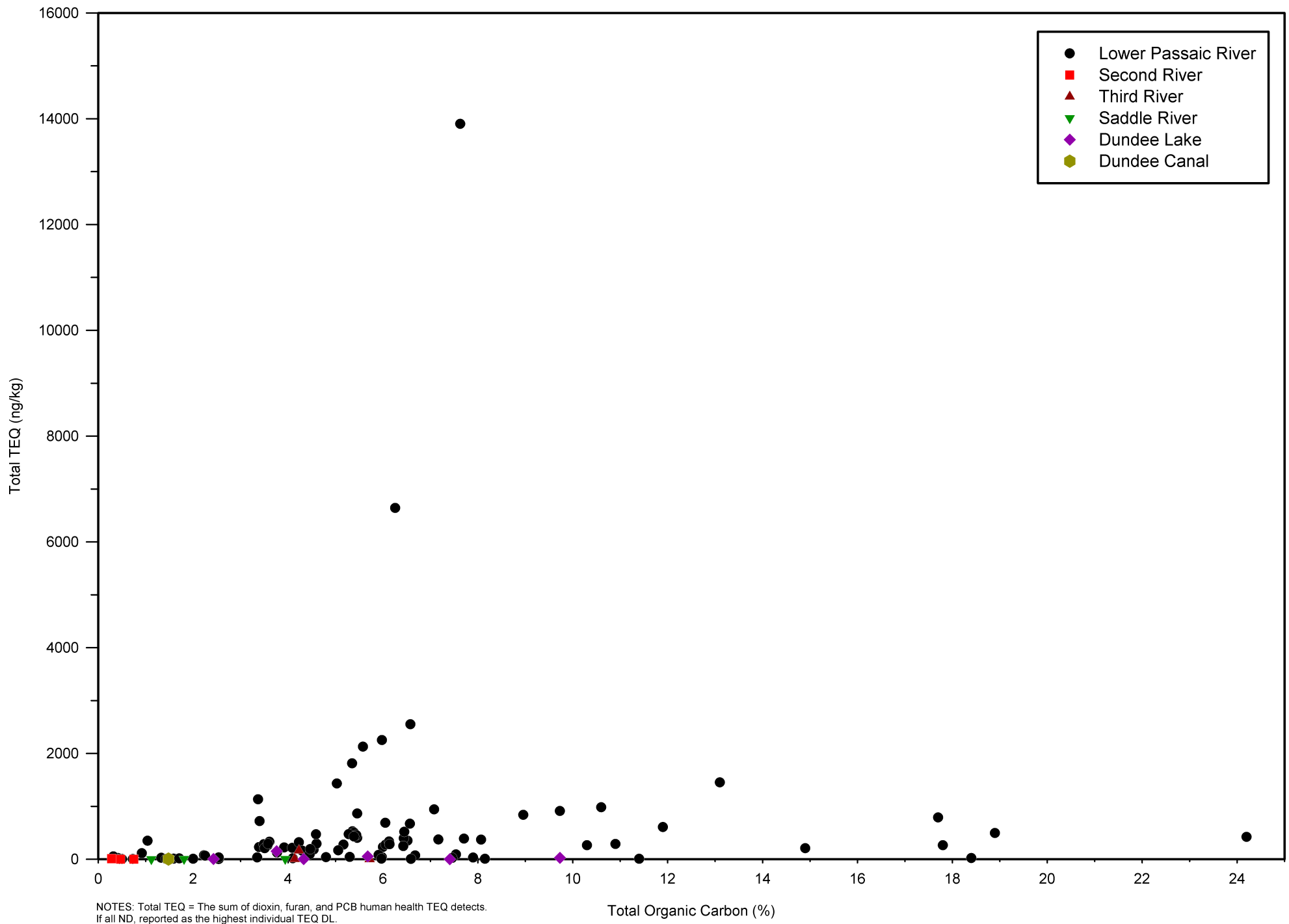


Figure 3-4a

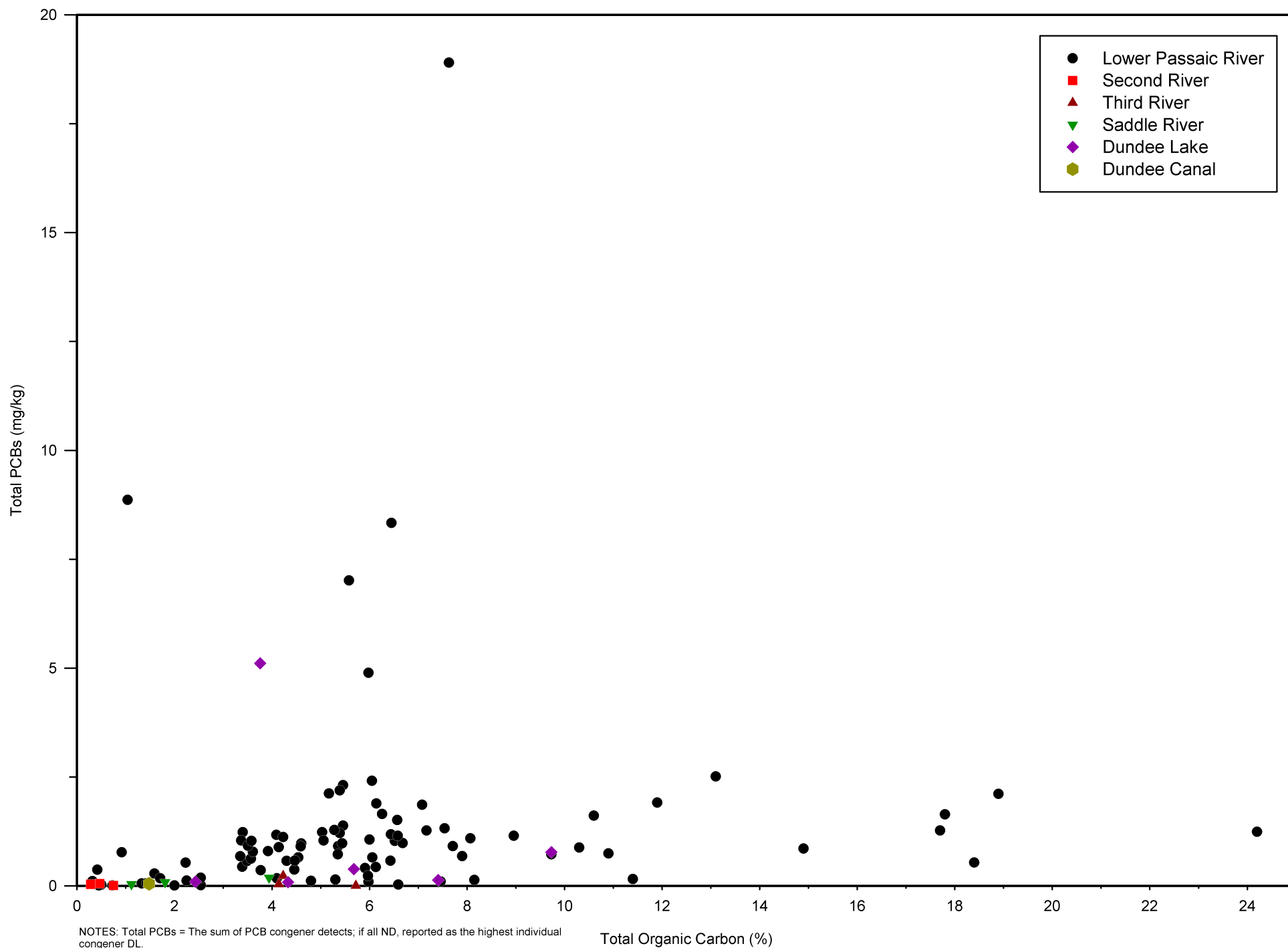
3-5.a Surficial Concentration vs. Total Organic Carbon, Linear Scale - 2,3,7,8-TCDD
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only

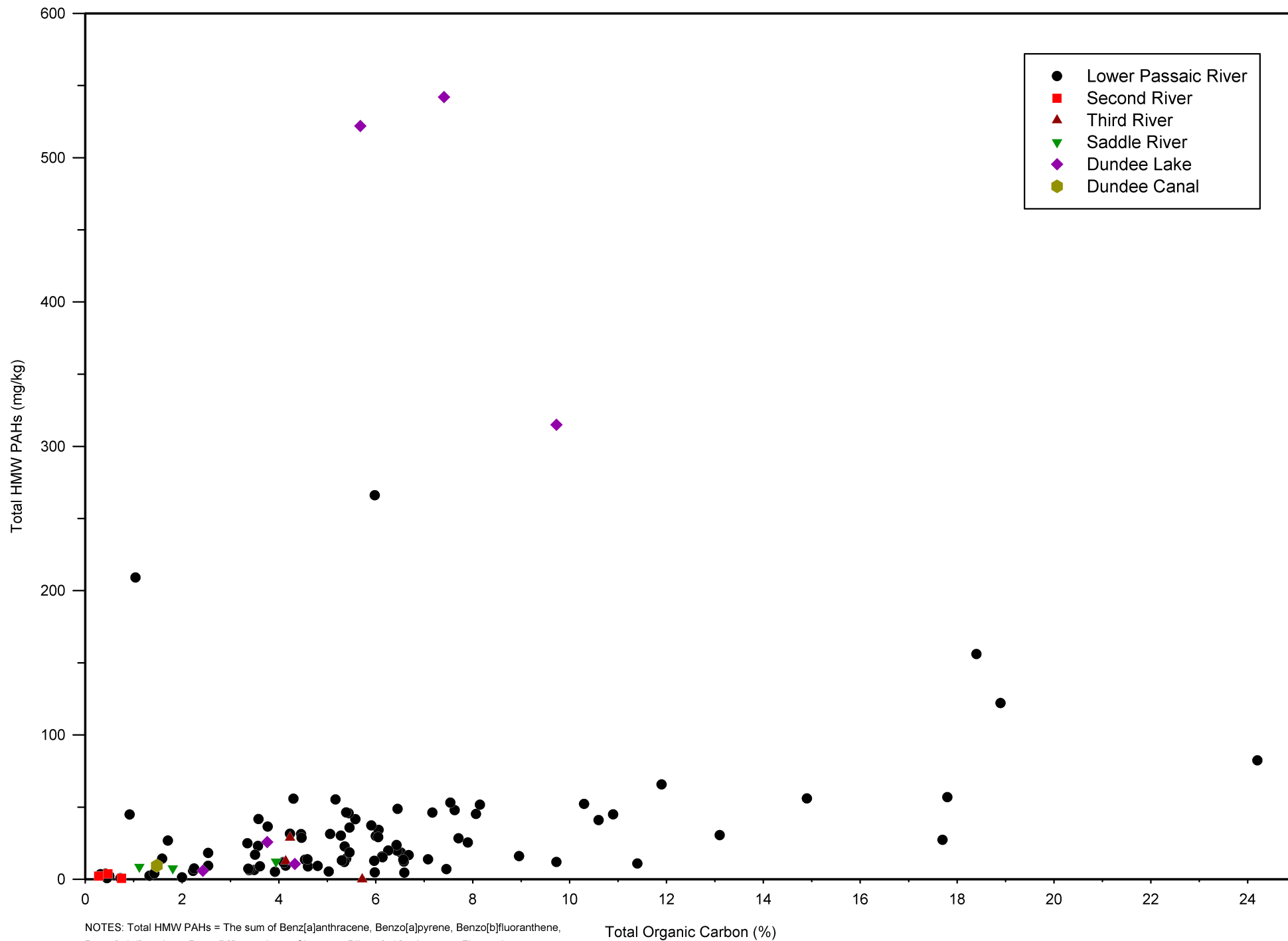


3-5.c Surficial Concentration vs. Total Organic Carbon, Linear Scale - Total PCBs
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



NOTES: Total PCBs = The sum of PCB congener detects; if all ND, reported as the highest individual congener DL.

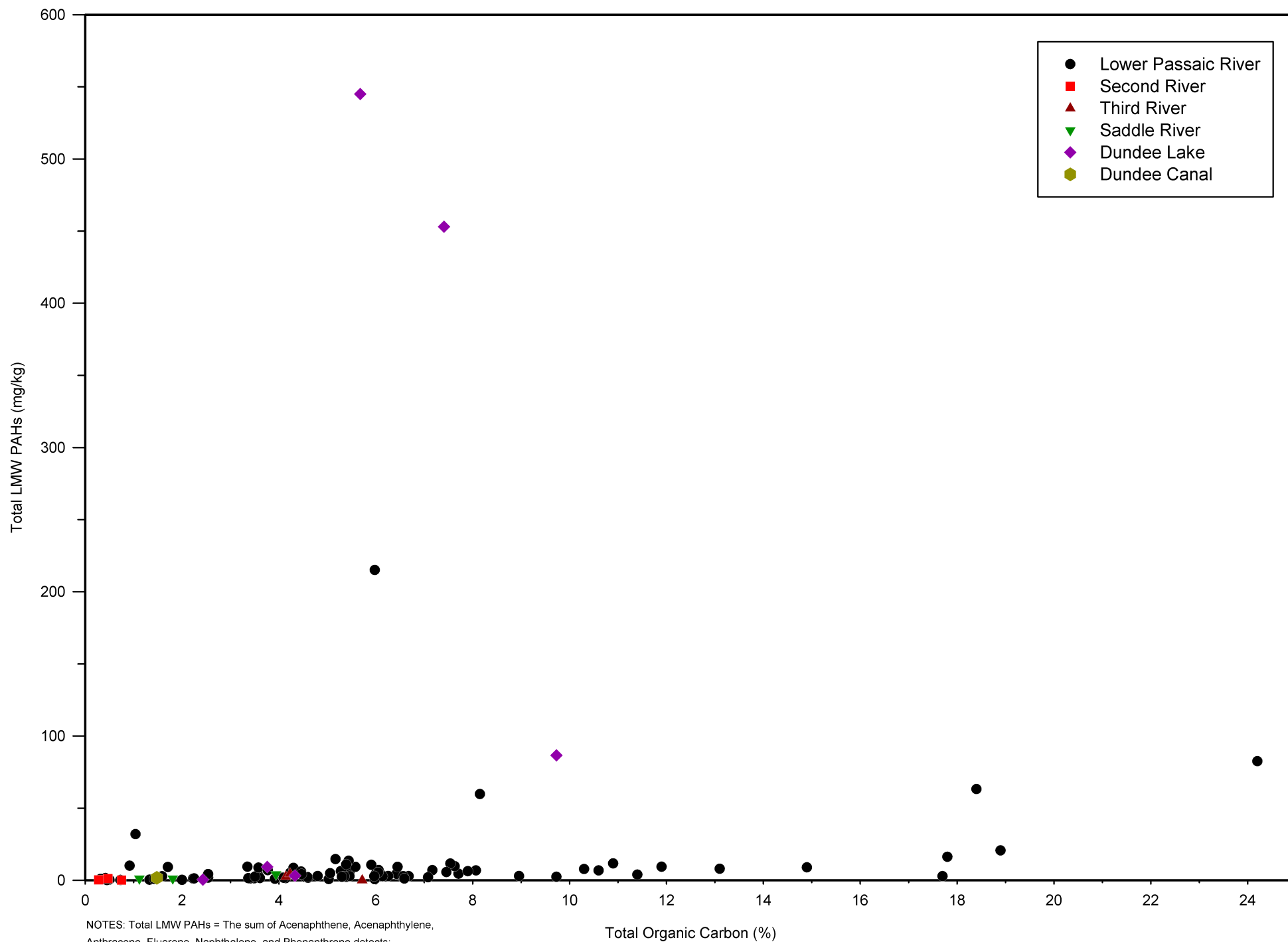
3-5.d Surficial Concentration vs. Total Organic Carbon, Linear Scale - Total HMW PAHs
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



NOTES: Total HMW PAHs = The sum of Benz[a]anthracene, Benzo[a]pyrene, Benzo[b]fluoranthene, Benzo[g,h,i]perylene, Benzo[k]fluoranthene, Chrysene, Dibenzo[a,h]anthracene, Fluoranthene, Indeno[1,2,3-cd]pyrene, and Pyrene detects; if all ND, reported as the highest individual analyte DL.

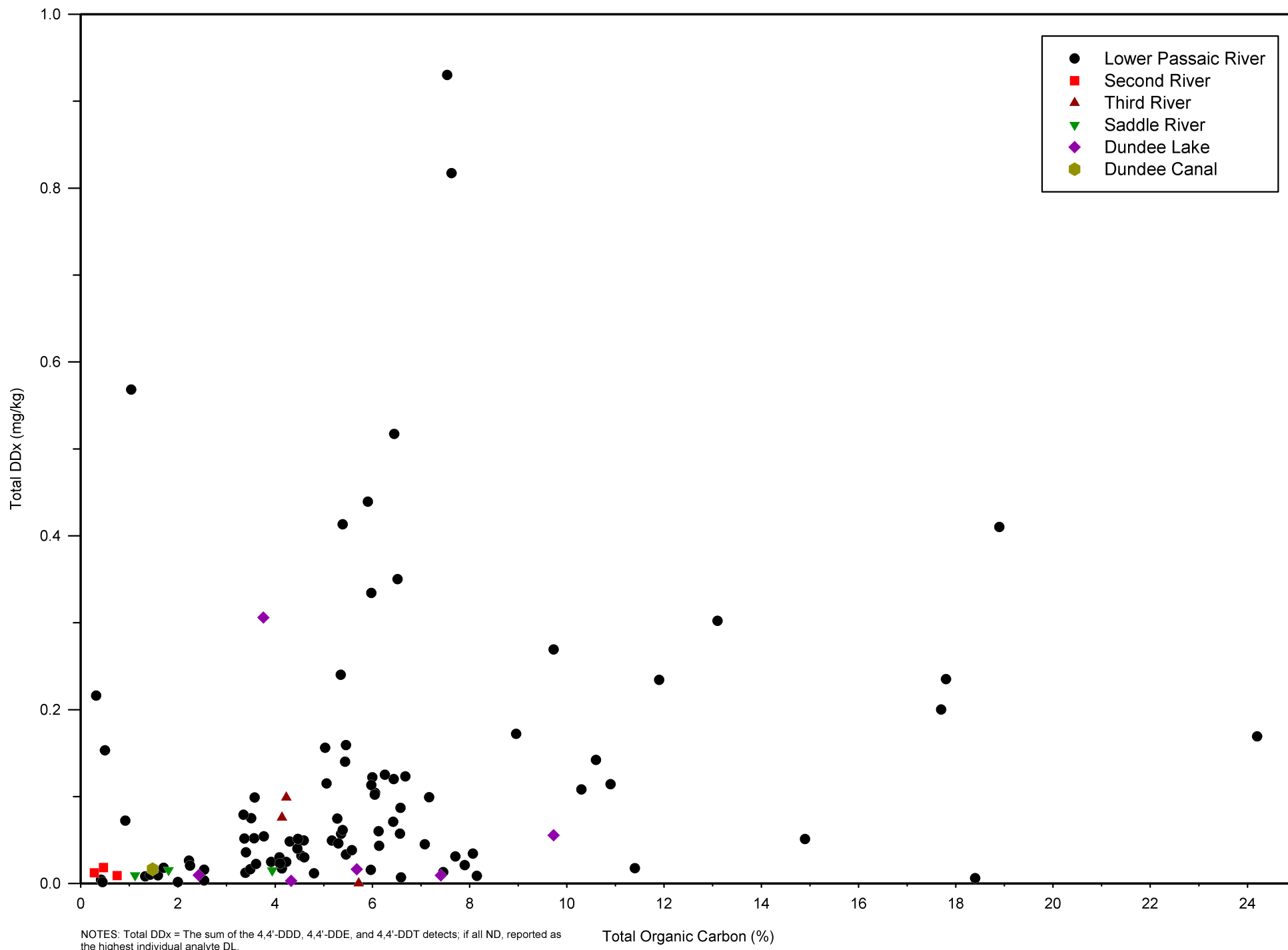
Total Organic Carbon (%)

3-5.e Surficial Concentration vs. Total Organic Carbon, Linear Scale - Total LMW PAHs
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



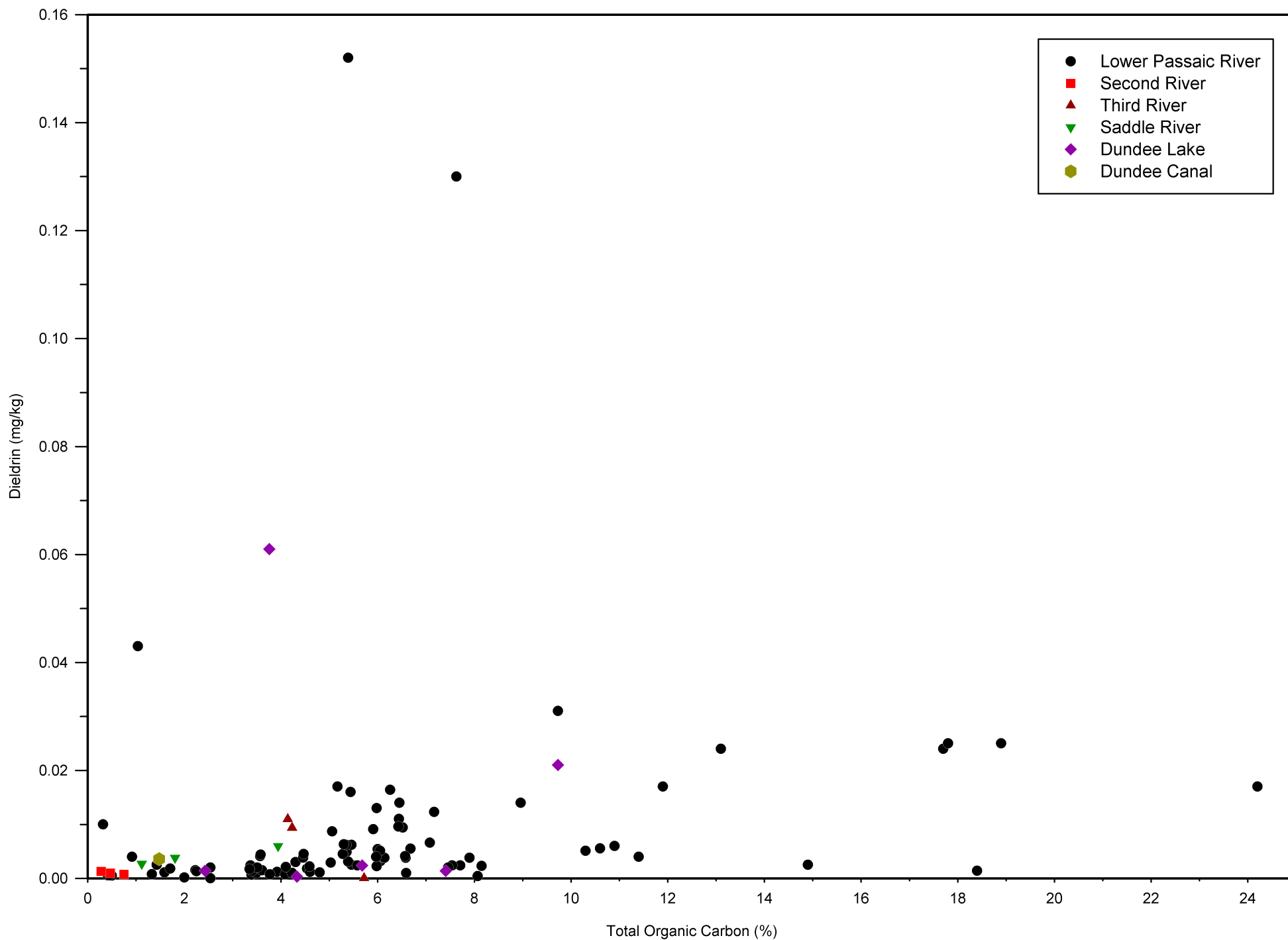
NOTES: Total LMW PAHs = The sum of Acenaphthene, Acenaphthylene, Anthracene, Fluorene, Naphthalene, and Phenanthrene detects; if all ND, reported as the highest individual analyte DL.

3-5.f Surficial Concentration vs. Total Organic Carbon, Linear Scale - Total DDx
 Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only

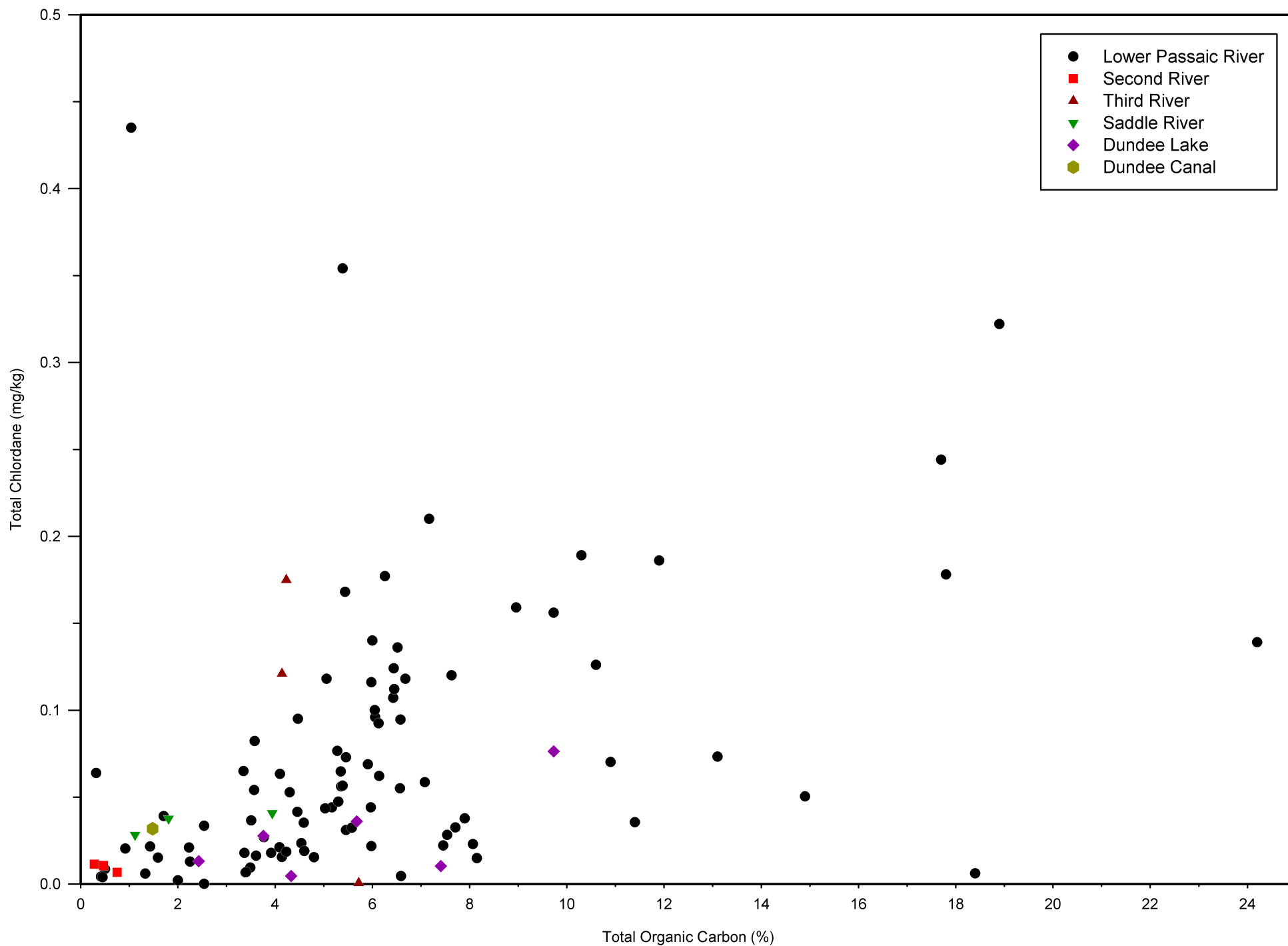


NOTES: Total DDx = The sum of the 4,4'-DDD, 4,4'-DDE, and 4,4'-DDT detects; if all ND, reported as the highest individual analyte DL.

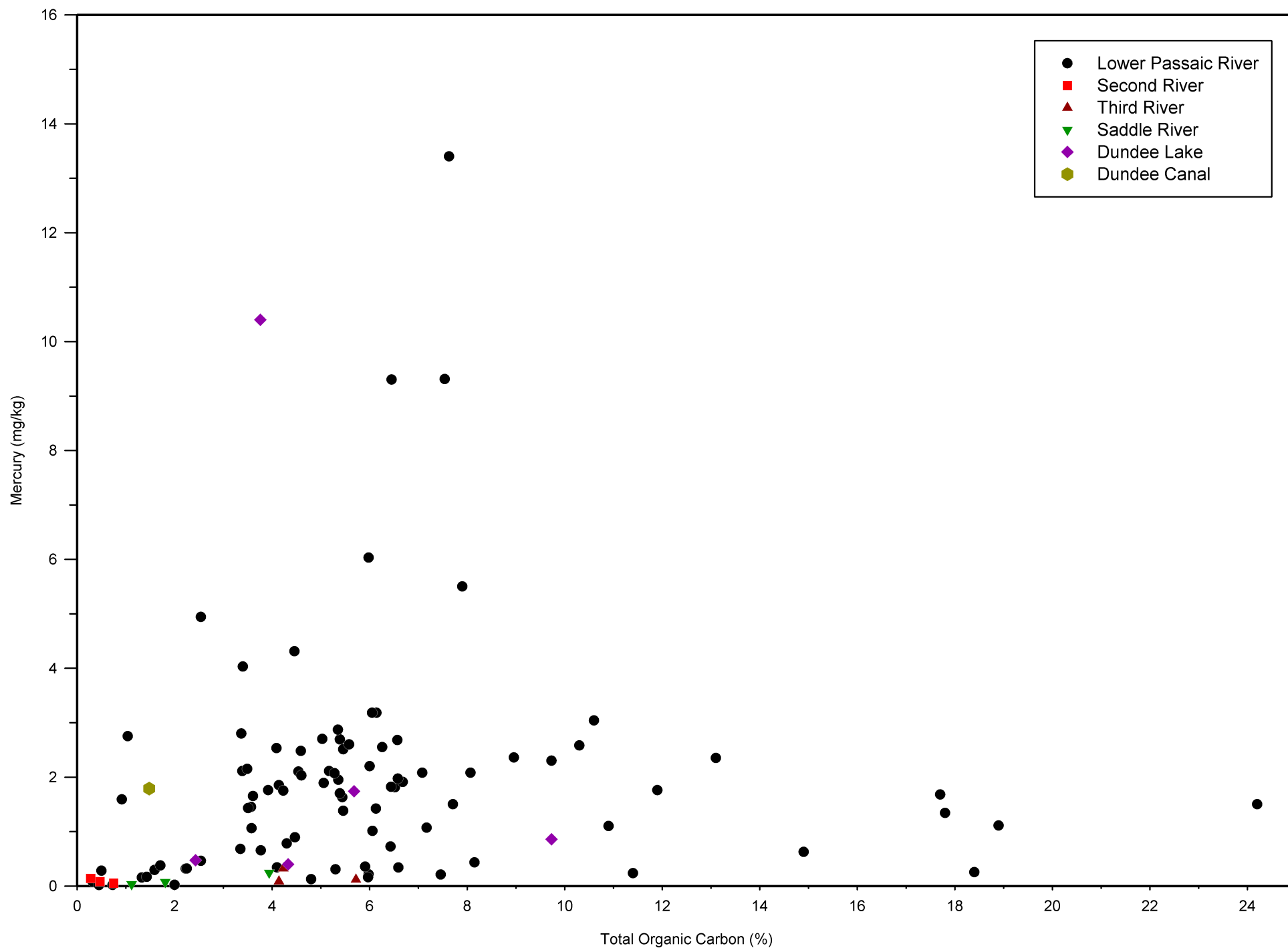
3-5.g Surficial Concentration vs. Total Organic Carbon, Linear Scale - Dieldrin
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



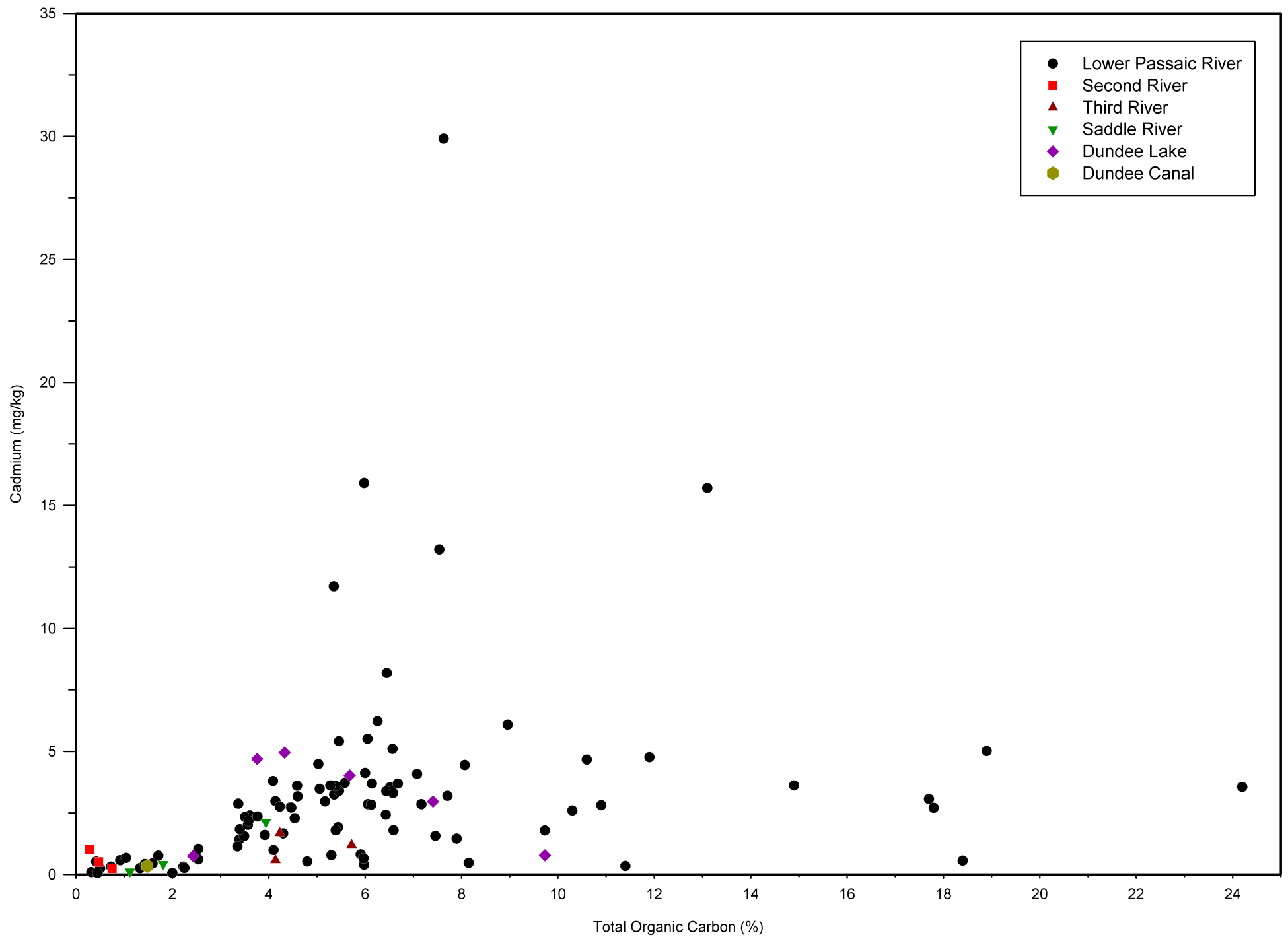
3-5.h Surficial Concentration vs. Total Organic Carbon, Linear Scale - Total Chlordane
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



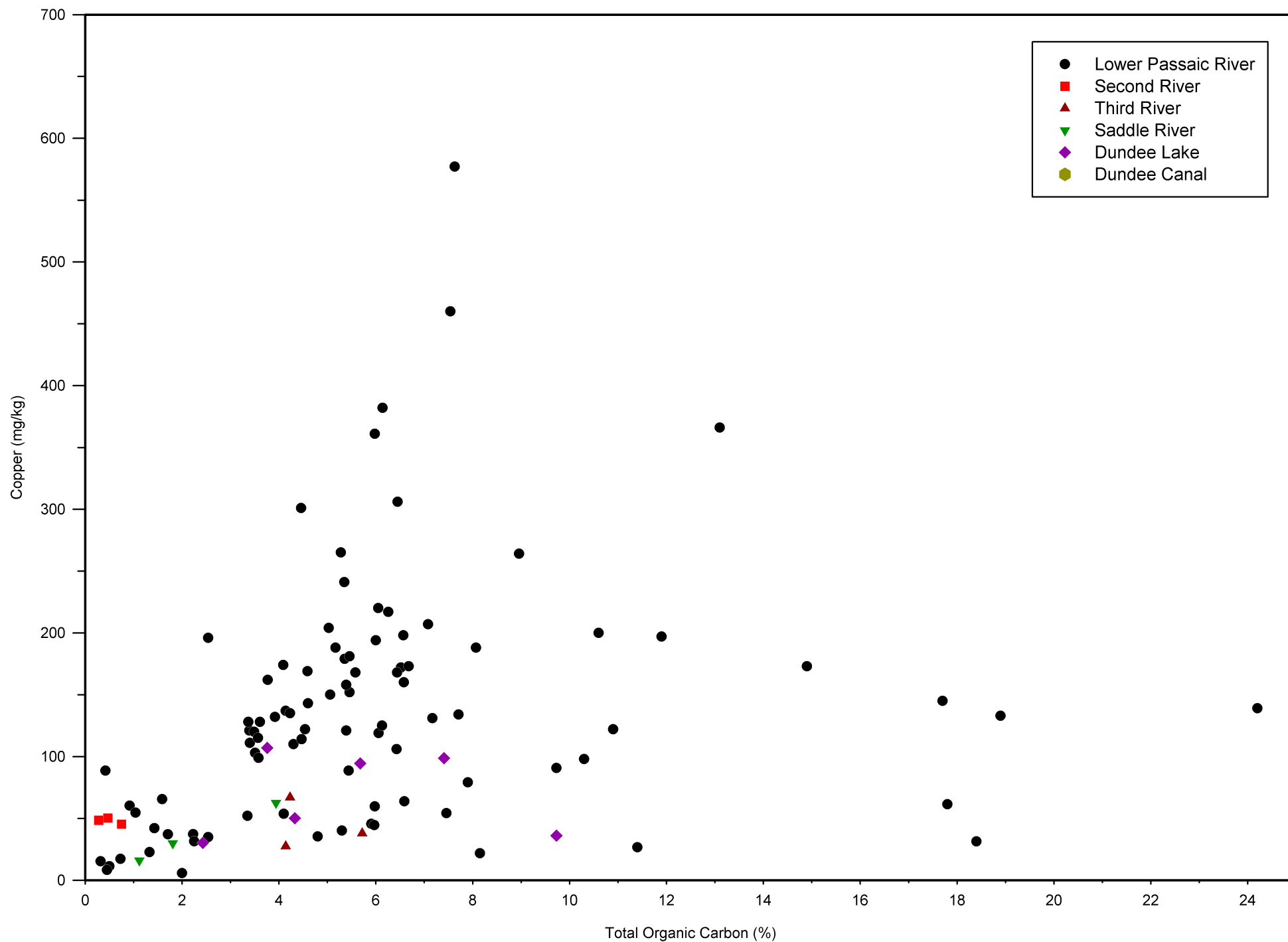
3-5.i Surficial Concentration vs. Total Organic Carbon, Linear Scale - Mercury
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



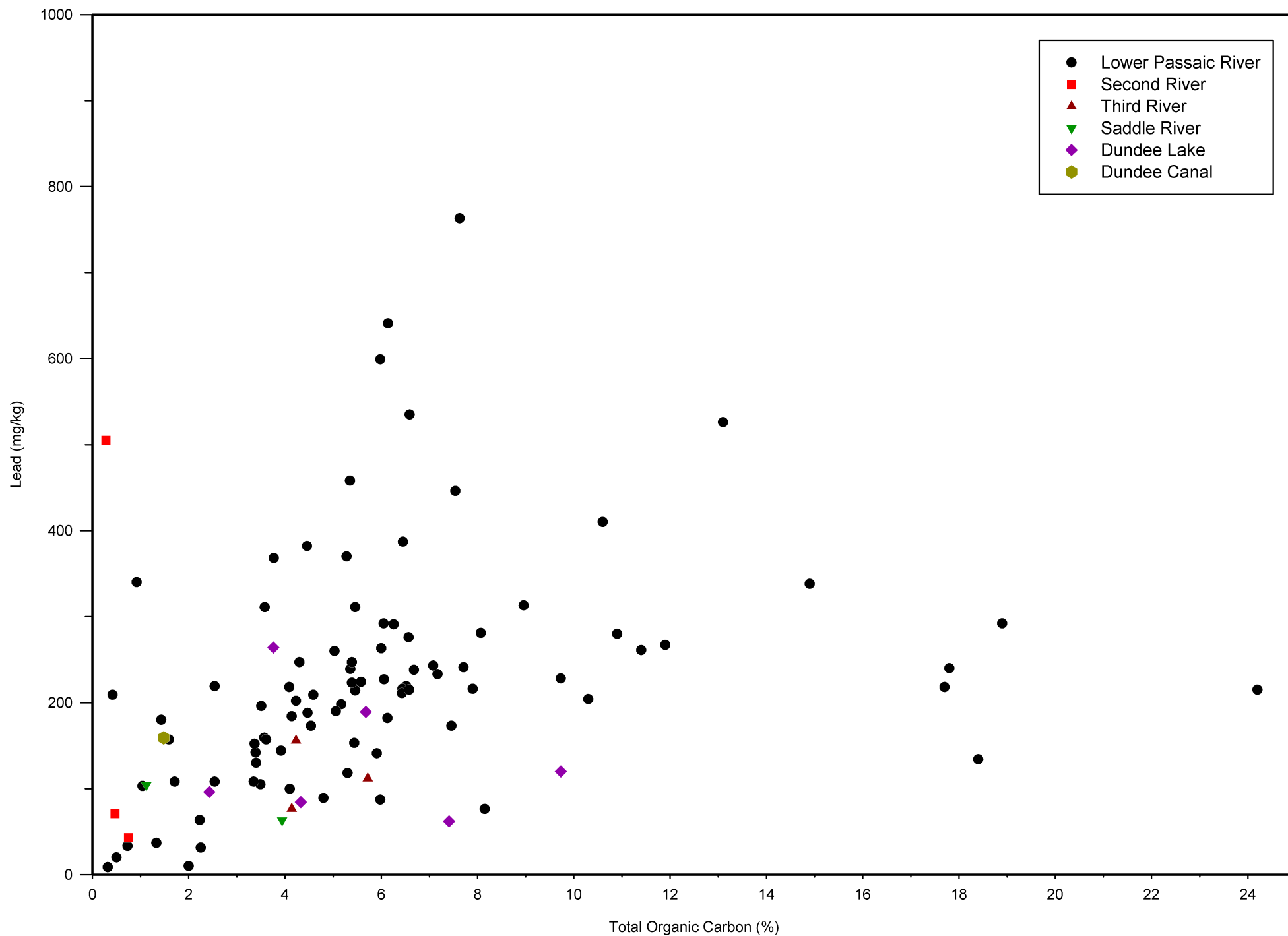
3-5.j Surficial Concentration vs. Total Organic Carbon, Linear Scale - Cadmium
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



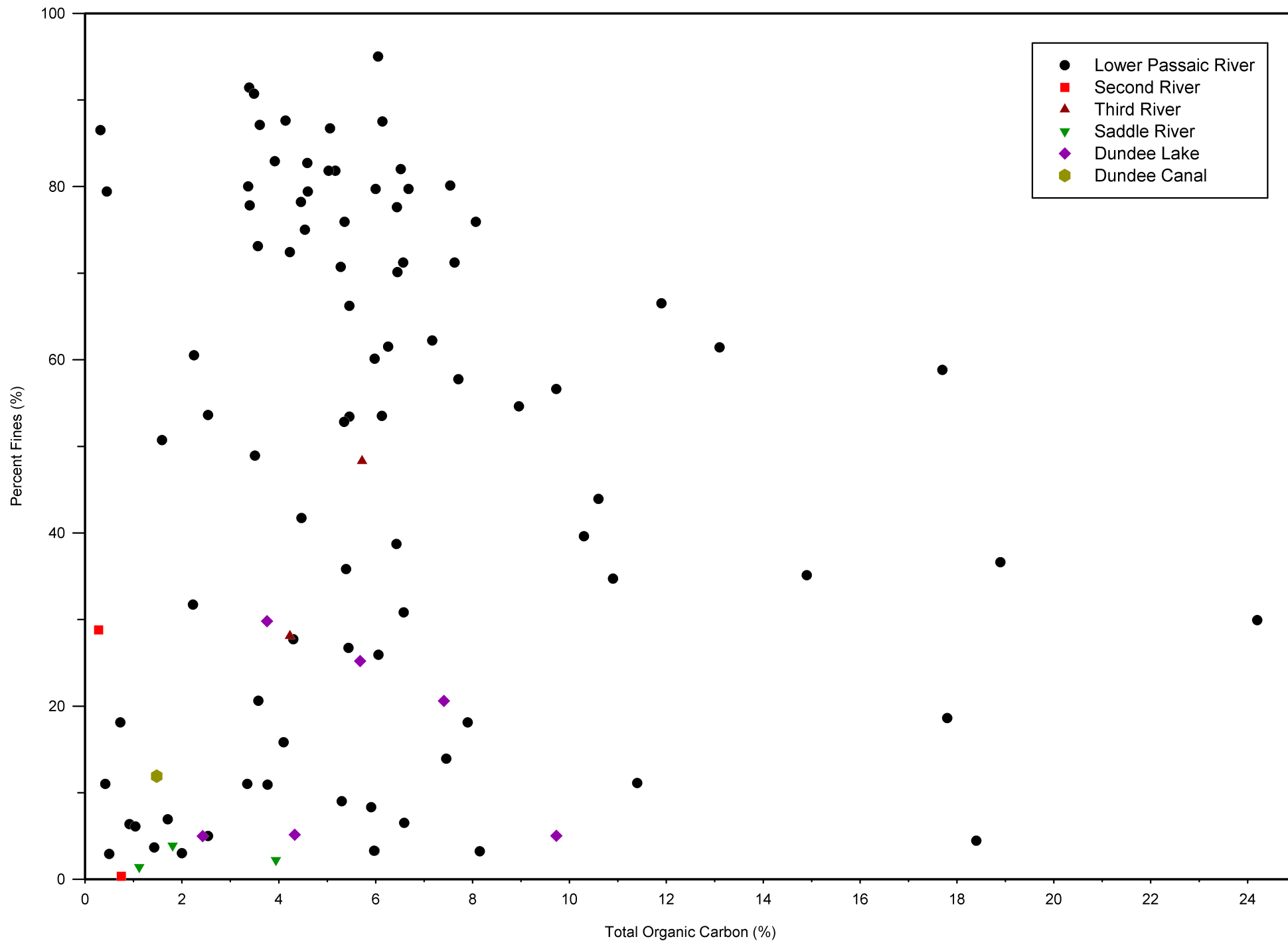
3-5.k Surficial Concentration vs. Total Organic Carbon, Linear Scale - Copper
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



3-5.I Surficial Concentration vs. Total Organic Carbon, Linear Scale - Lead
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



3-5.m Surficial Concentration vs. Total Organic Carbon, Linear Scale - Percent Fines
Surficial Sediments (0.0ft - 0.5ft), 2008 LRC Cores Only



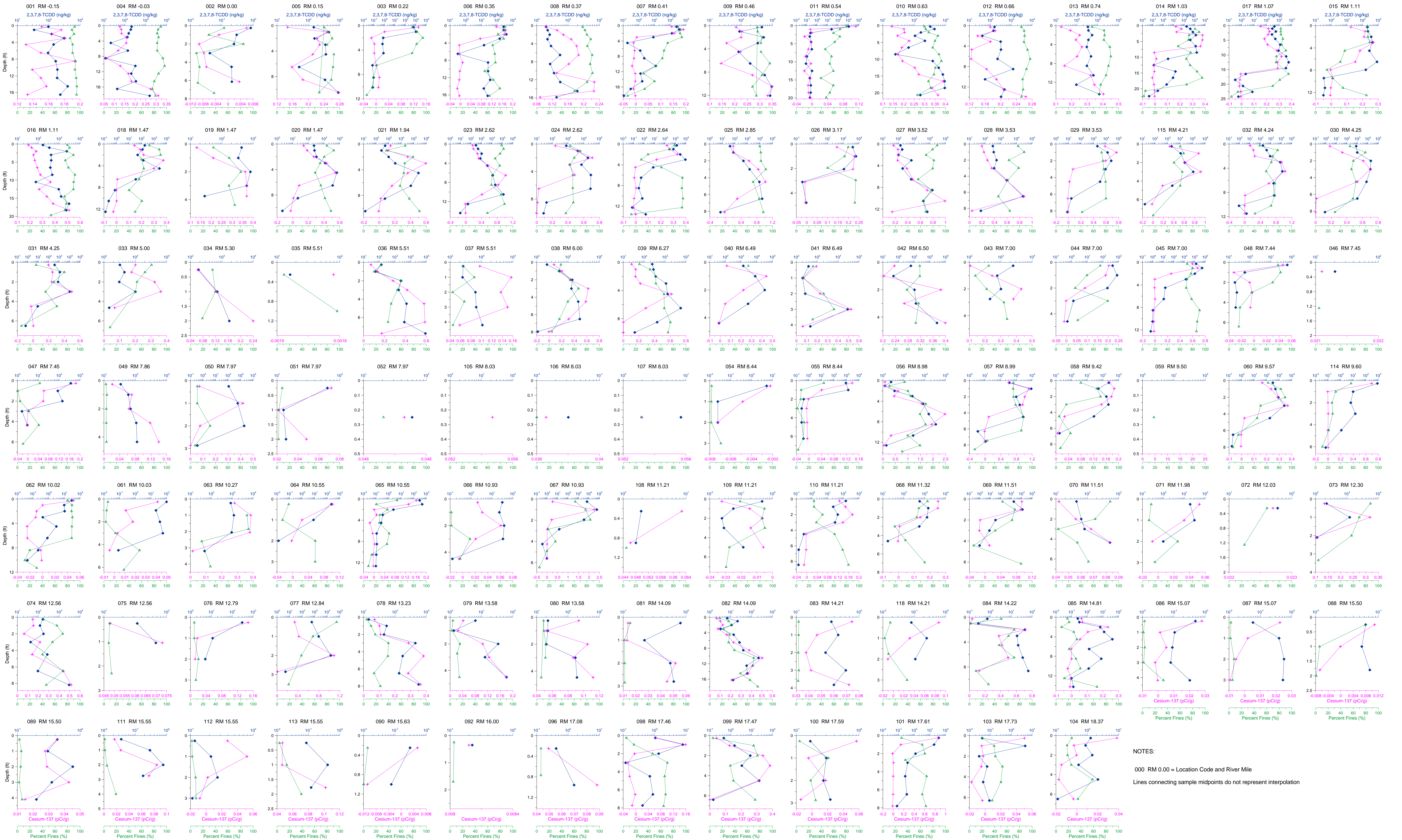


Figure 3-6.a
Depth Profiles of 2,3,7,8-TCDD with Cesium-137 and Percent Fines

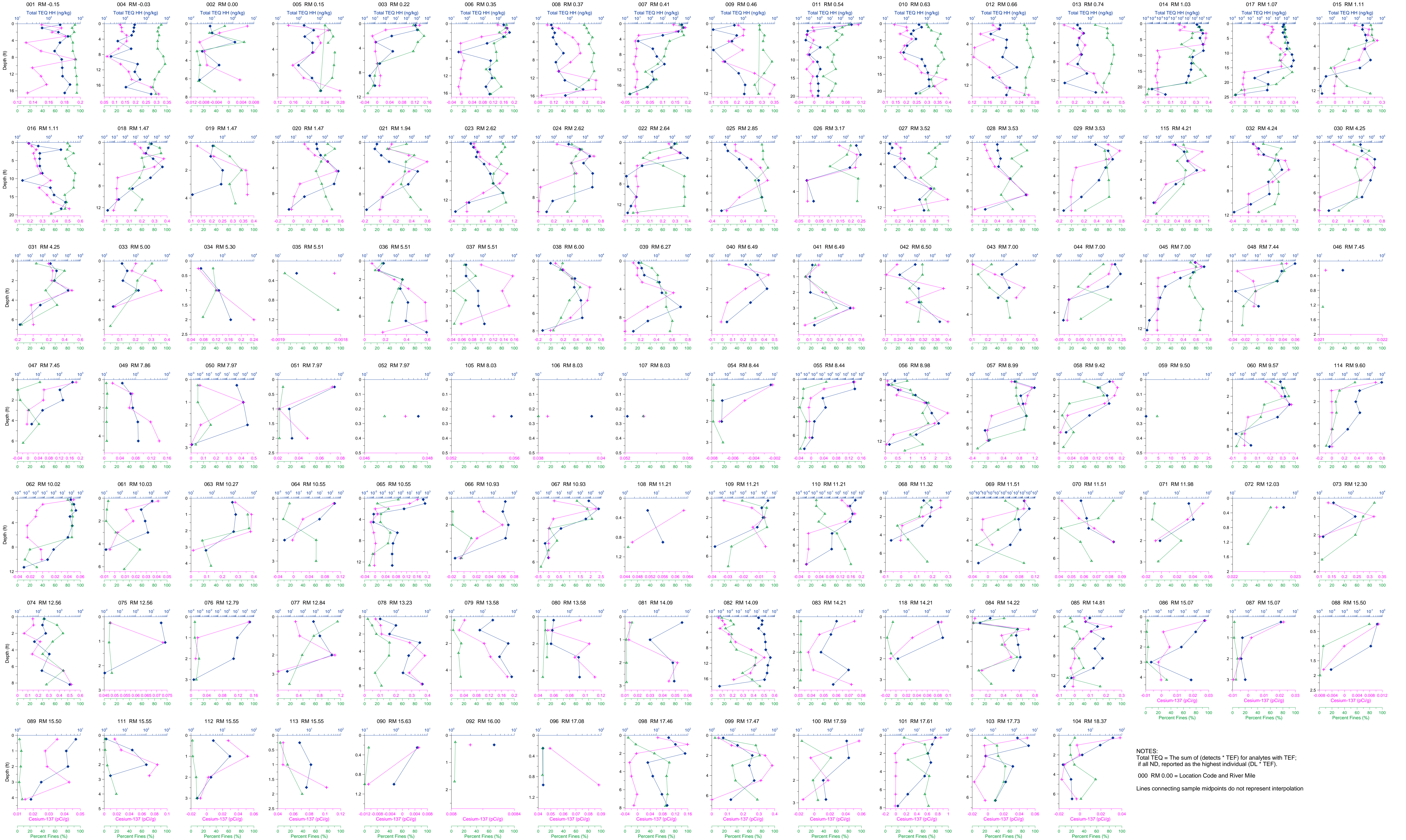
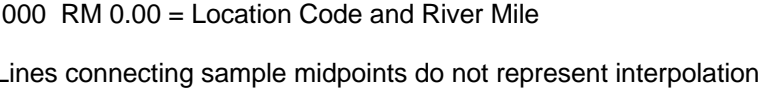


Figure 3-6.b
Depth Profiles of Total TEQ with Cesium-137 and Percent Fines



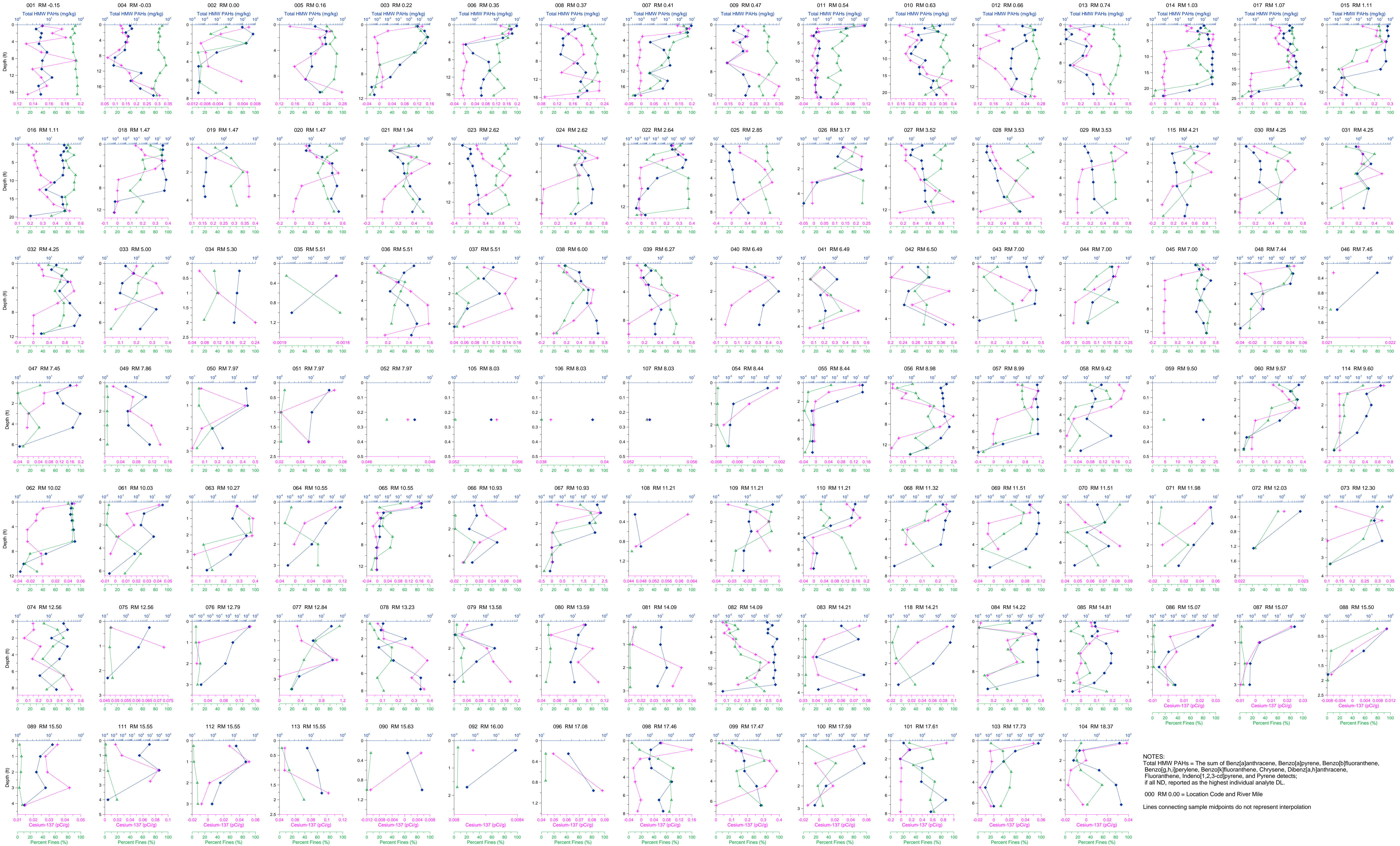


Figure 3-6.d
Depth Profiles of Total HMW PAHs with Cesium-137 and Percent Fines

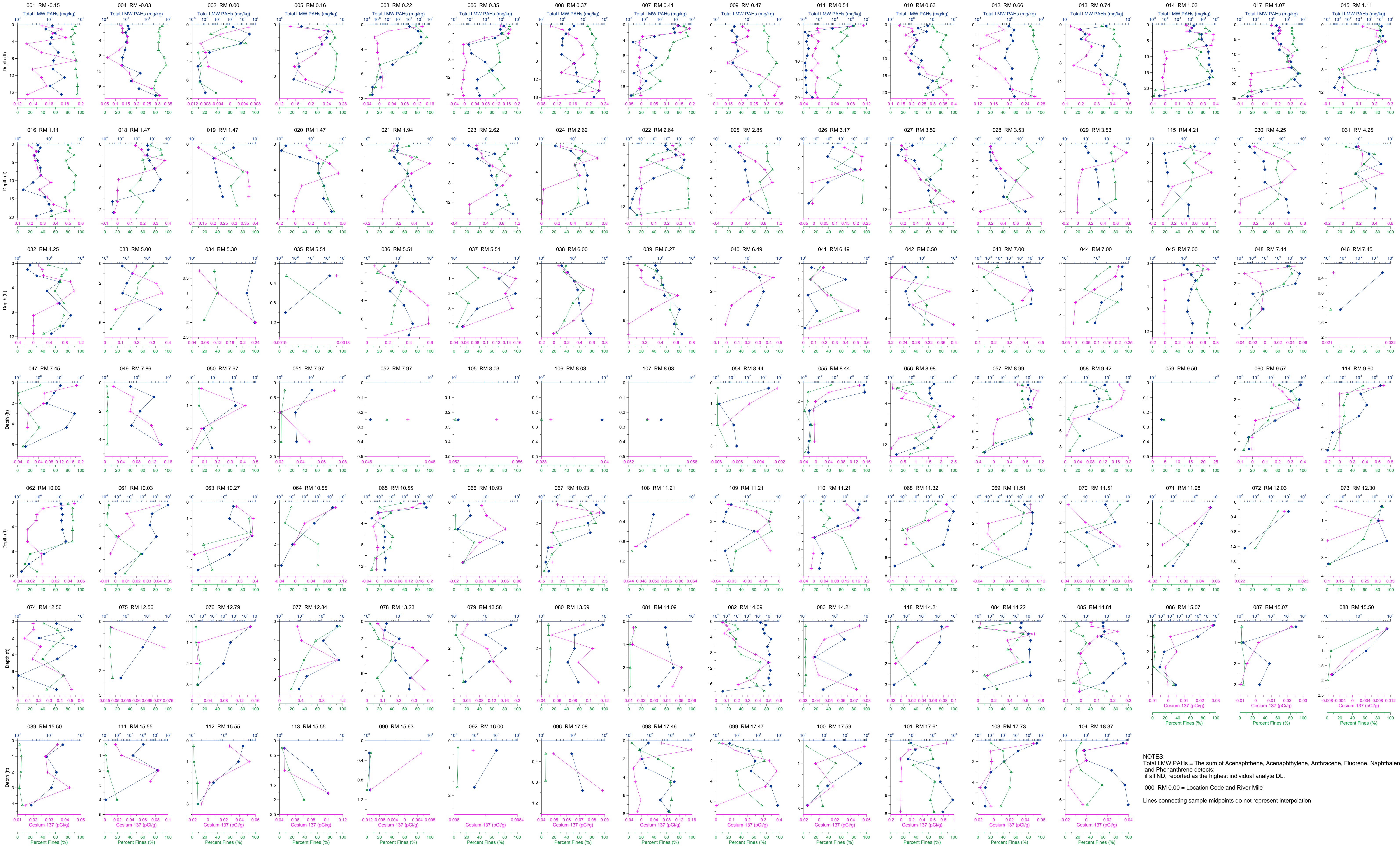


Figure 3-6.e
Depth Profiles of Total LMW PAHs with Cesium-137 and Percent Fines

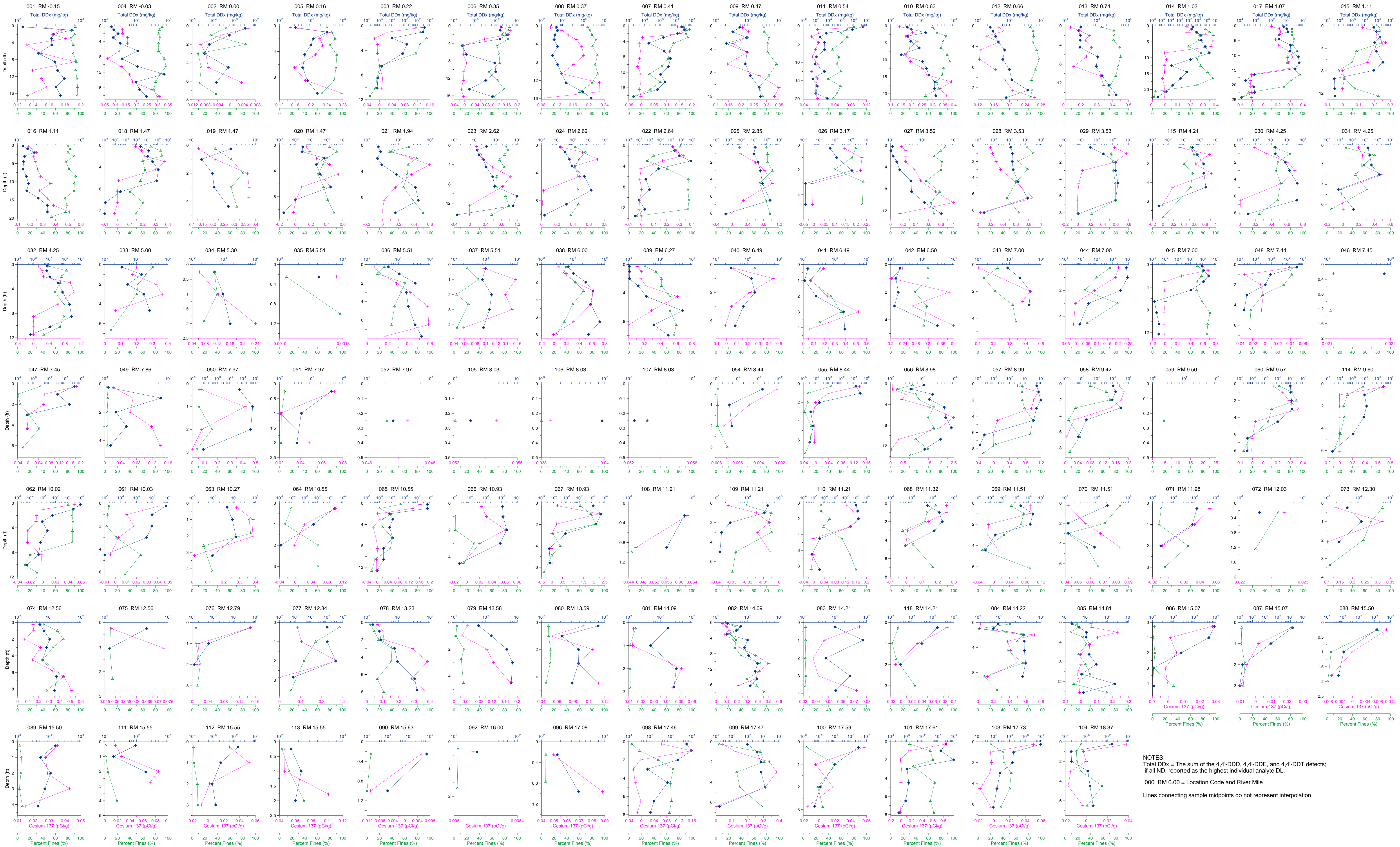
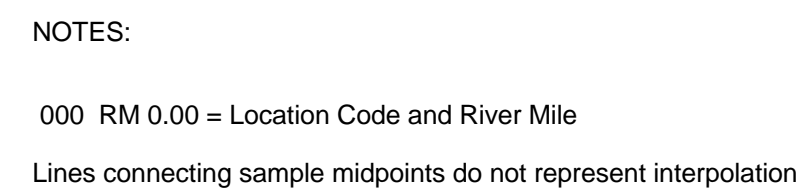


Figure 3-6.f
Depth Profiles of Total DDx with Cesium-137 and Percent Fines



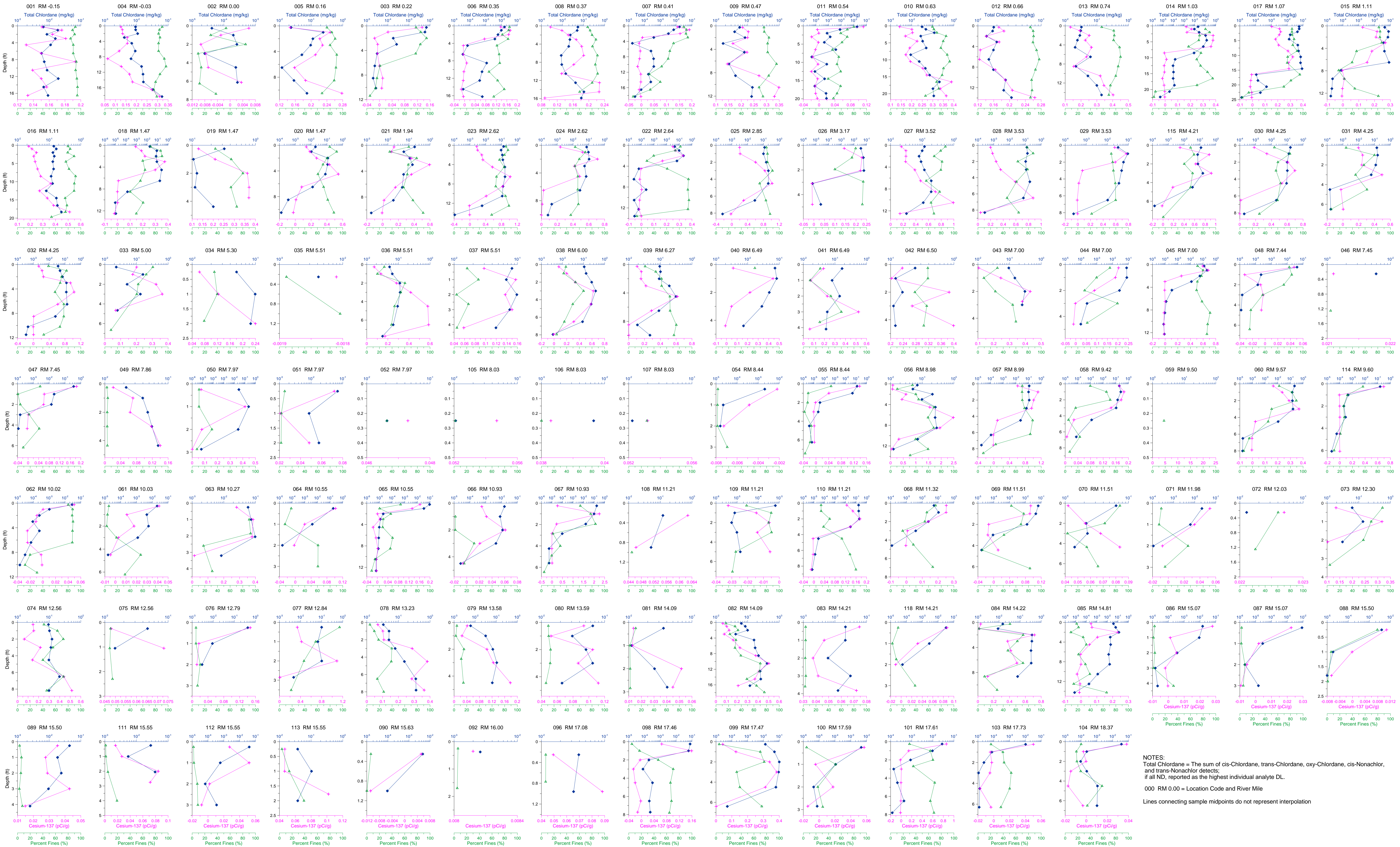


Figure 3-6.h
Depth Profiles of Total Chlordane with Cesium-137 and Percent Fines

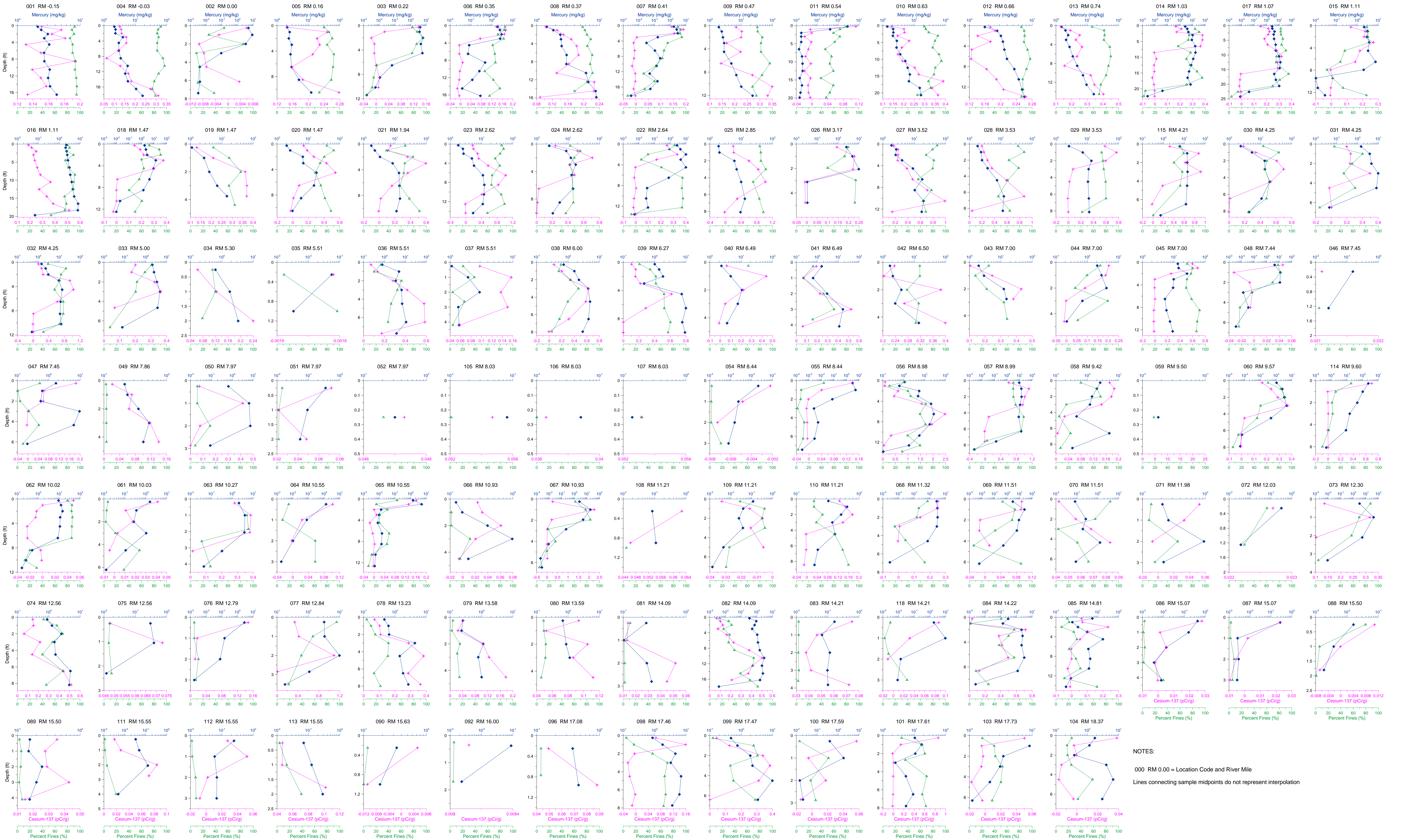
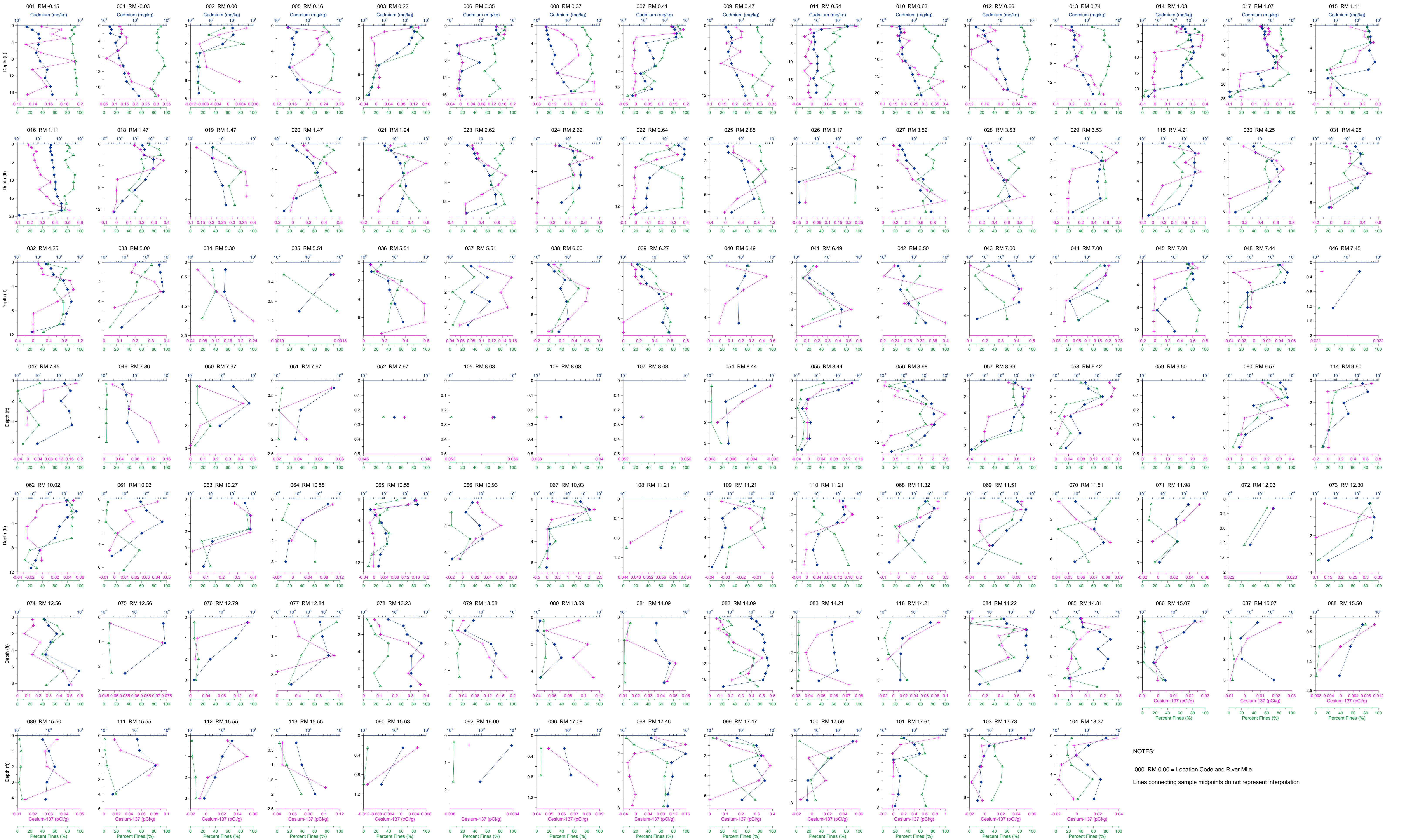


Figure 3-6.i
Depth Profiles of Mercury with Cesium-137 and Percent Fines

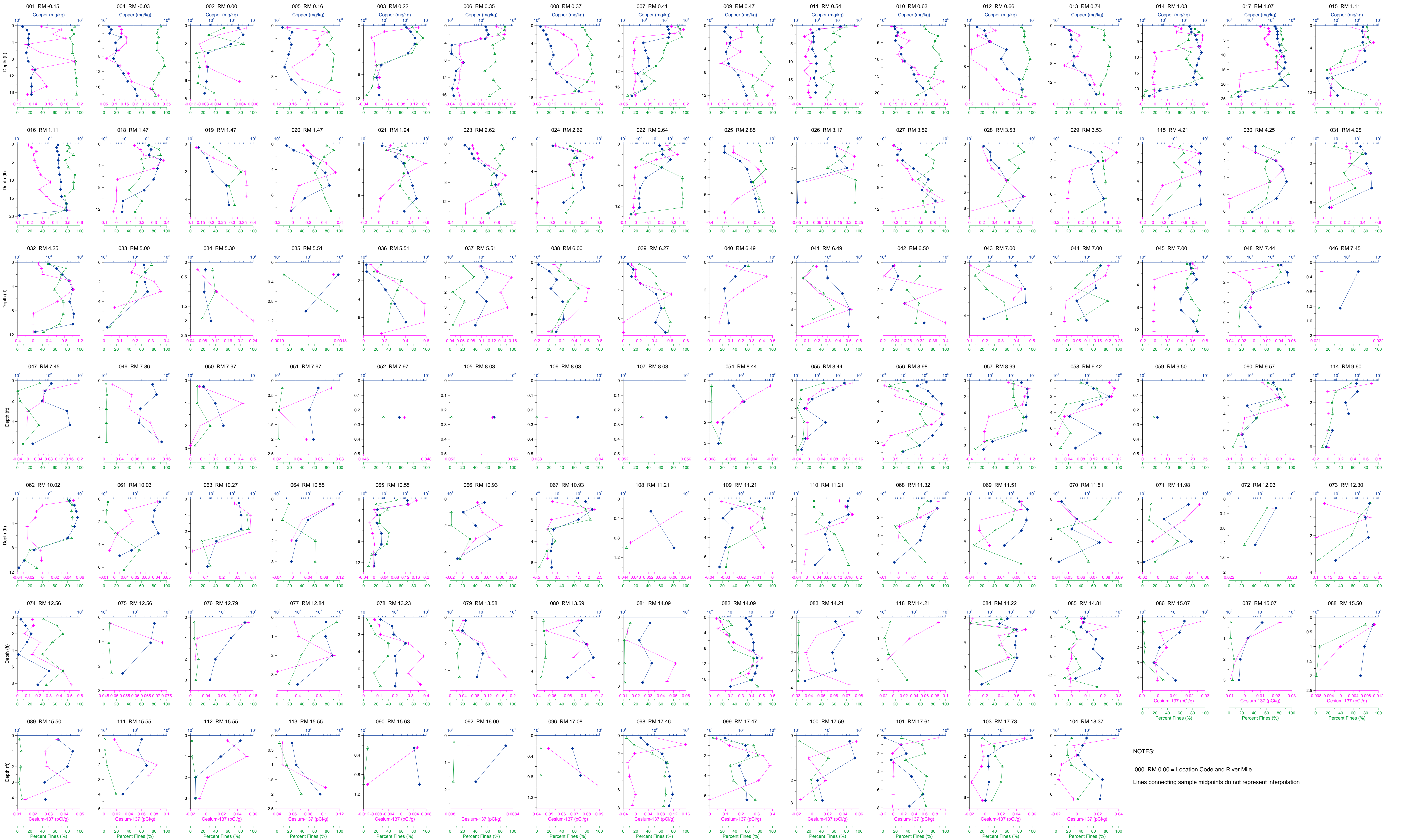


NOTES:

000 RM 0.00 = Location Code and River Mile

Lines connecting sample midpoints do not represent interpolation

Figure 3-6.j
Depth Profiles of Cadmium with Cesium-137 and Percent Fines

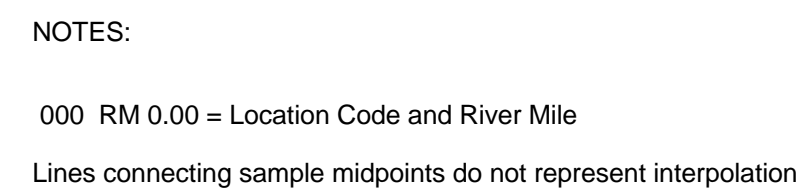


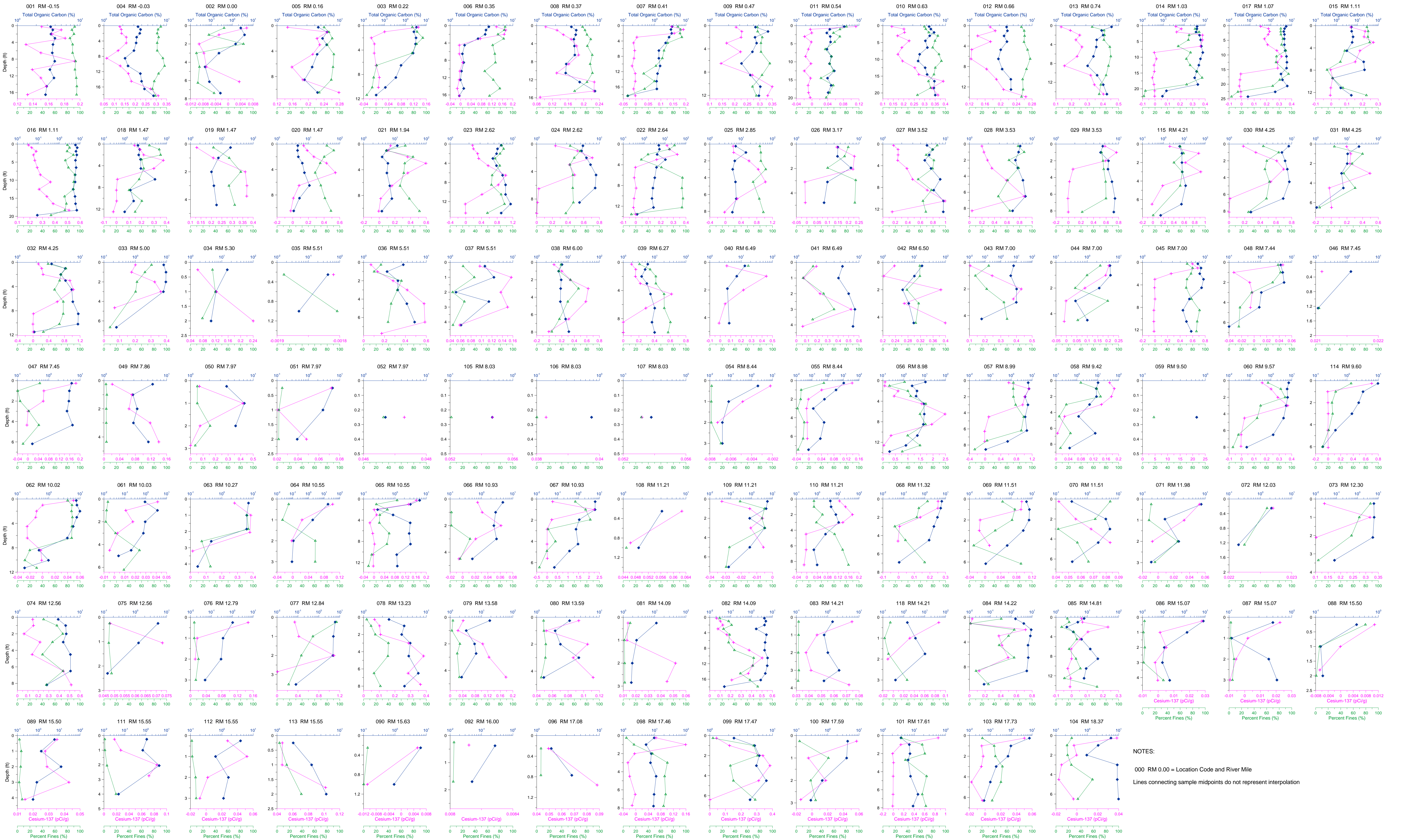
NOTES:

000 RM 0.00 = Location Code and River Mile

Lines connecting sample midpoints do not represent interpolation

Figure 3-6.k
Depth Profiles of Copper with Cesium-137 and Percent Fines





NOTES:

000 RM 0.00 = Location Code and River Mile

Lines connecting sample midpoints do not represent interpolation

Figure 3-6.m
Depth Profiles of Total Organic Carbon with Cesium-137 and Percent Fines

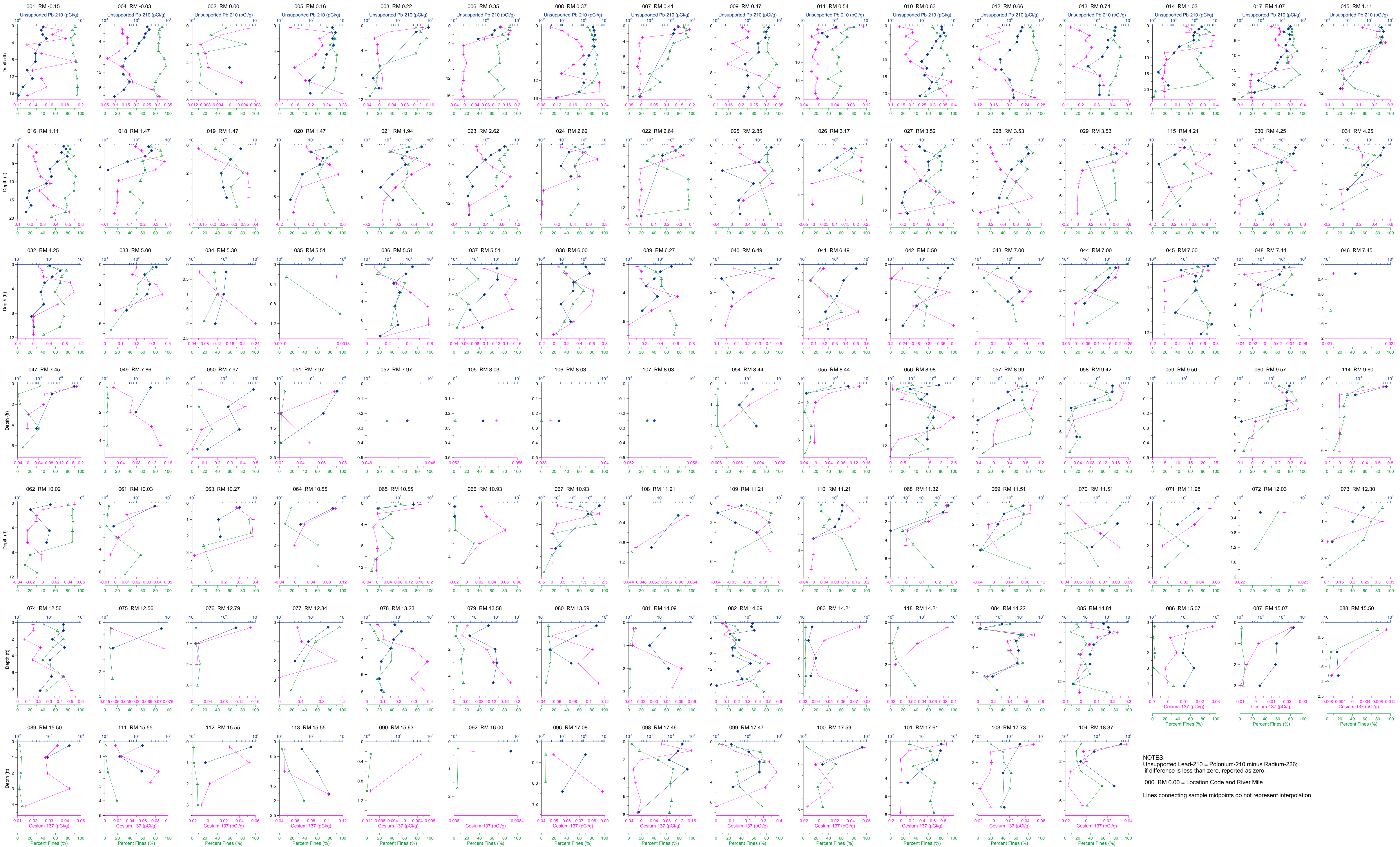
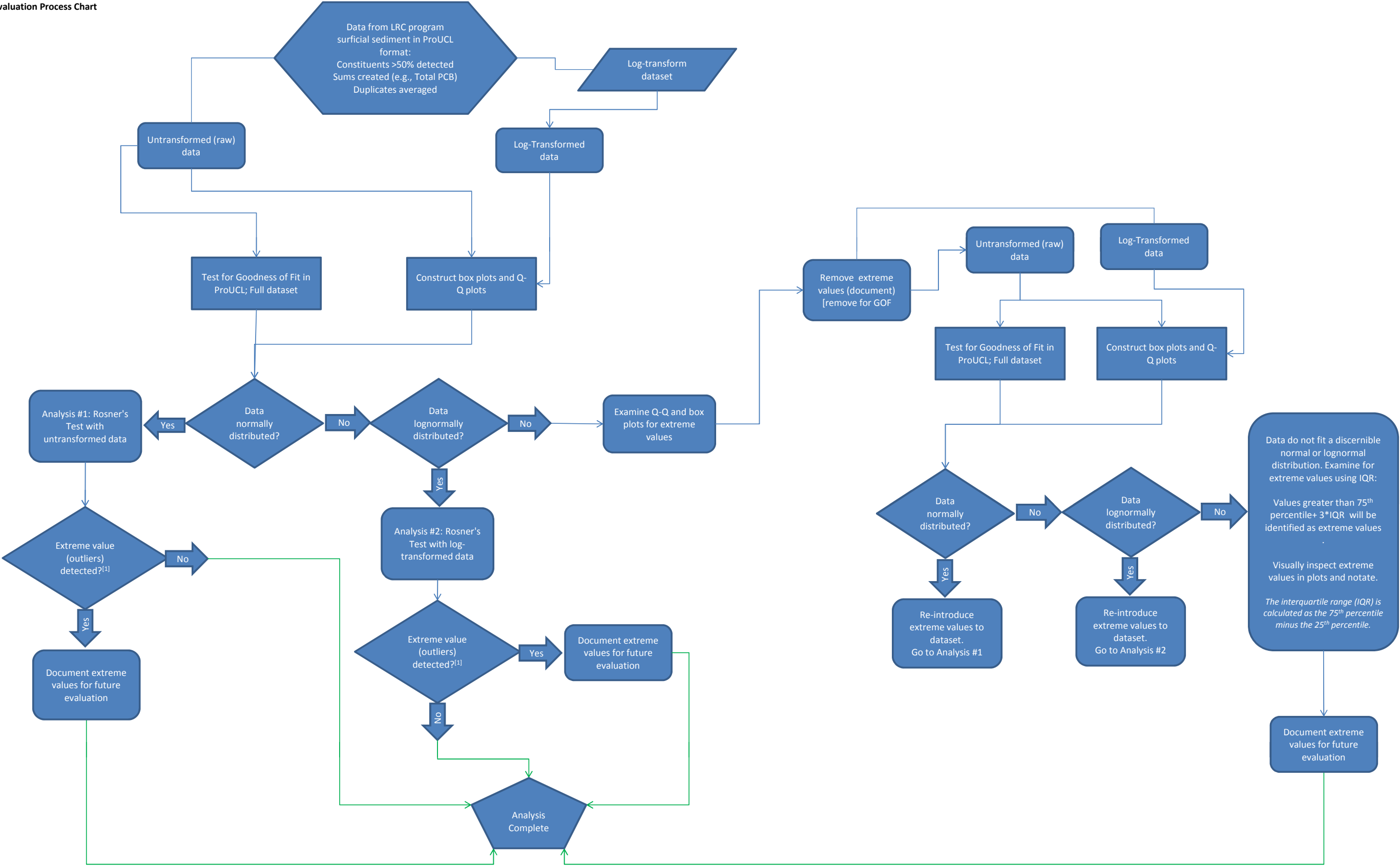


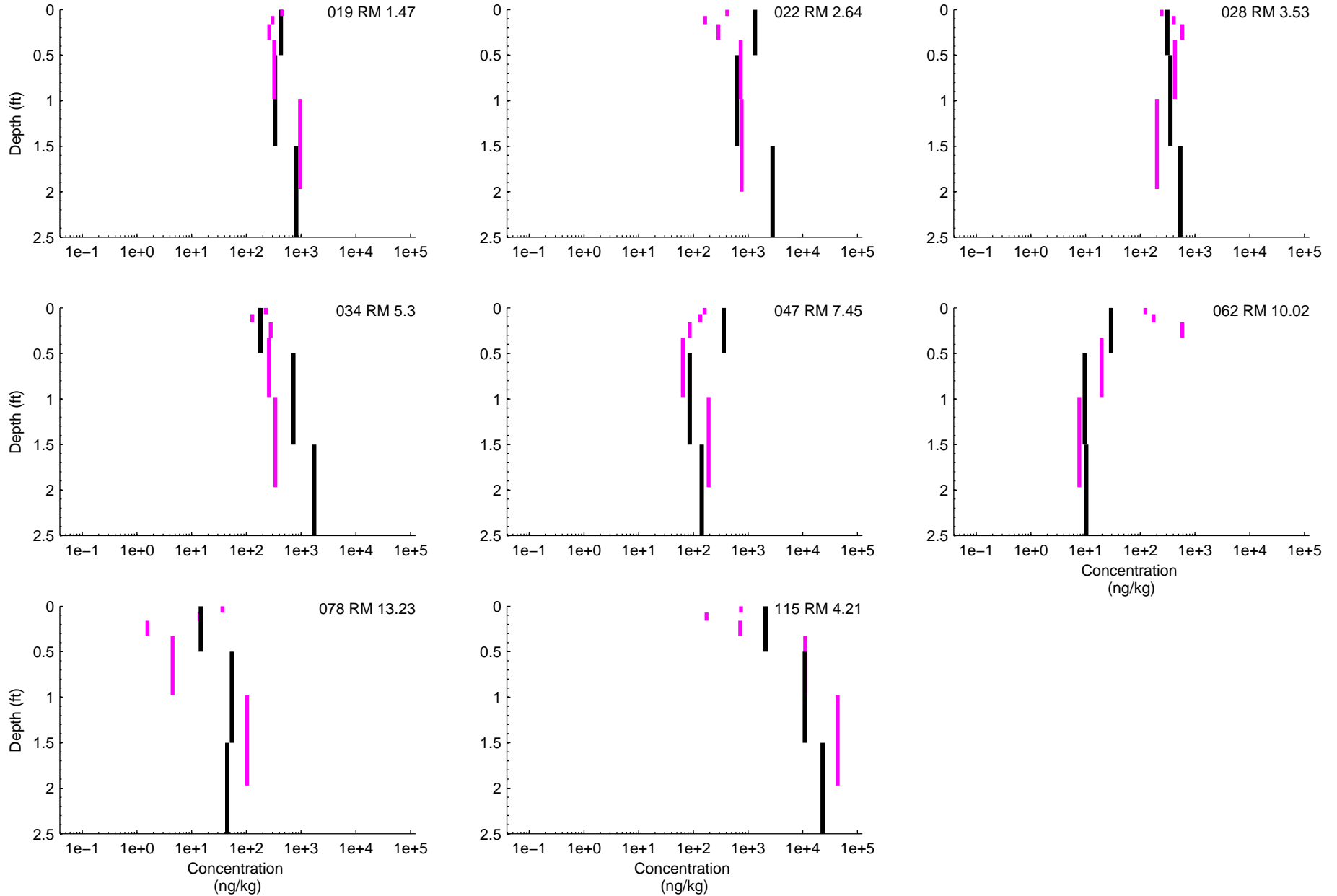
Figure 3-6.n
Depth Profiles of Unsupported Pb-210 with Cesium-137 and Percent Fines

Figure 3-7. Outlier Evaluation Process Chart



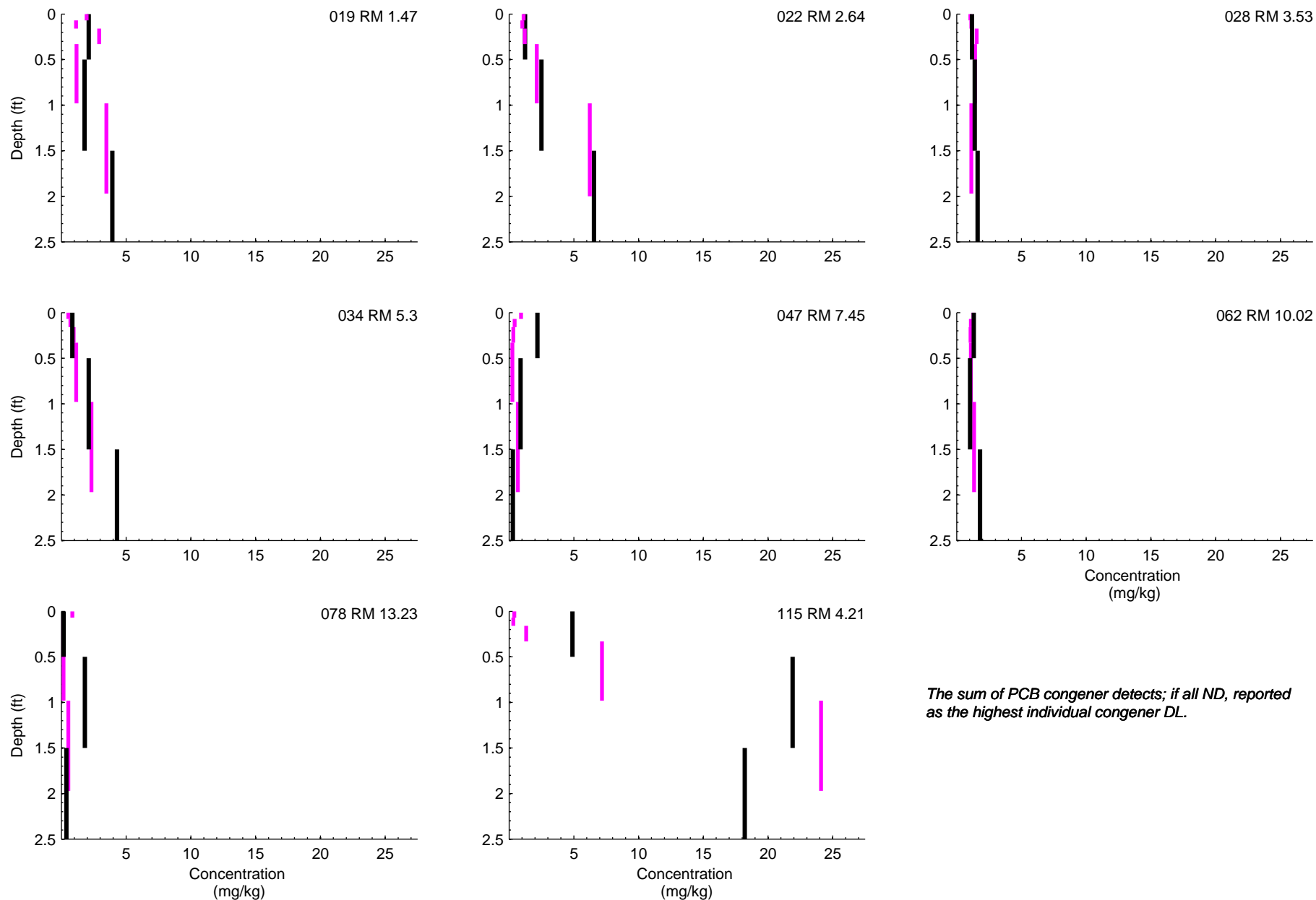
[1] Rosner's may be used to detect up to 10 extreme values. If 10 extreme values are documented, these values should be temporarily removed from the dataset, and Rosner's test run again on remaining data to identify any additional extreme values.

FIGURE 3–8.a Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations
2,3,7,8 TCDD (ng/kg)



Total TEQ = The sum of dioxin, furan, and PCB human health TEQ detects. If all ND, reported as the highest individual TEQ DL.

FIGURE 3–8.c Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations
Total PCBs (mg/kg)



The sum of PCB congener detects; if all ND, reported as the highest individual congener DL.

FIGURE 3–8.d Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations
Total HMW PAHs (mg/kg)

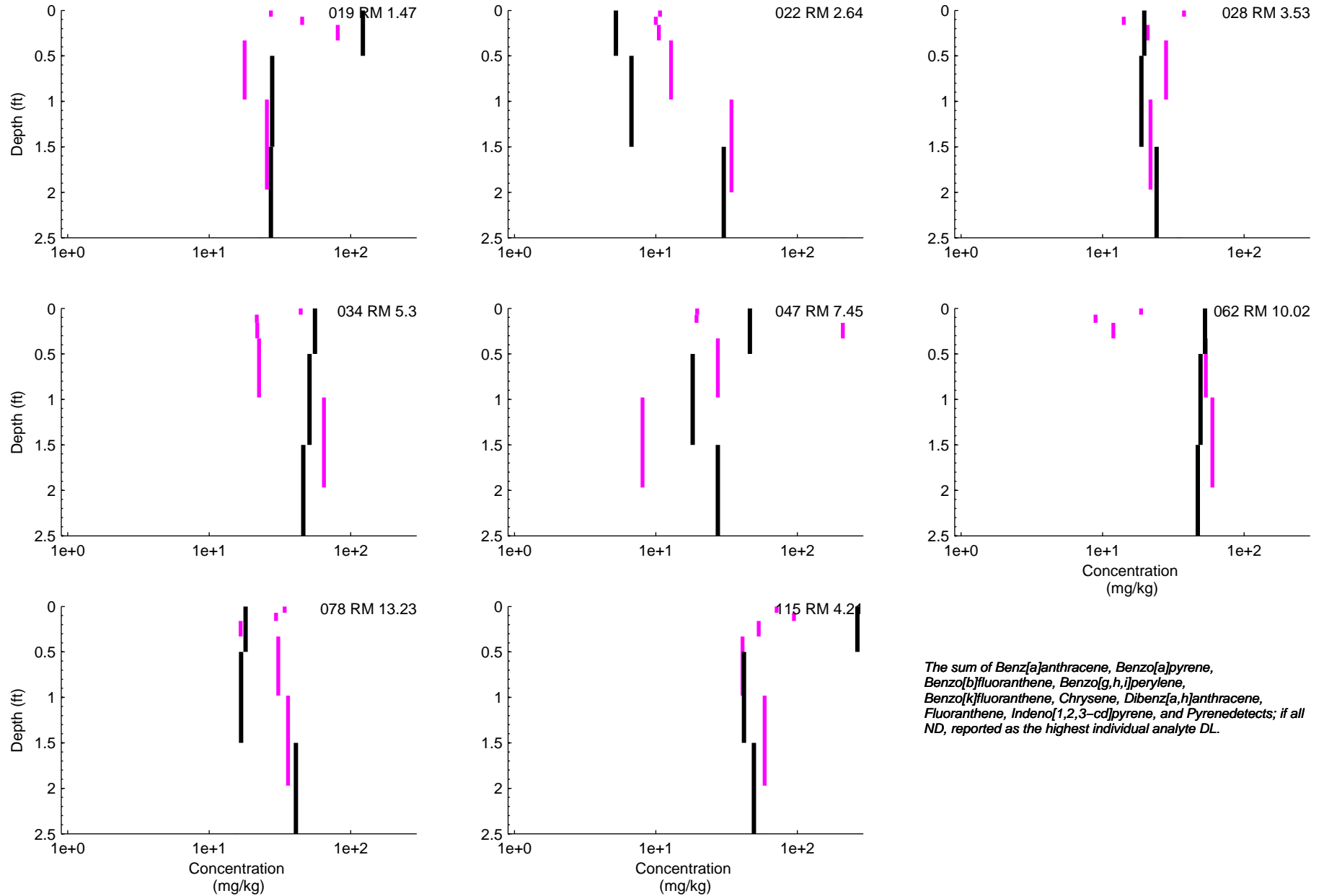


FIGURE 3–8.e Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations
Total LMW PAHs (mg/kg)

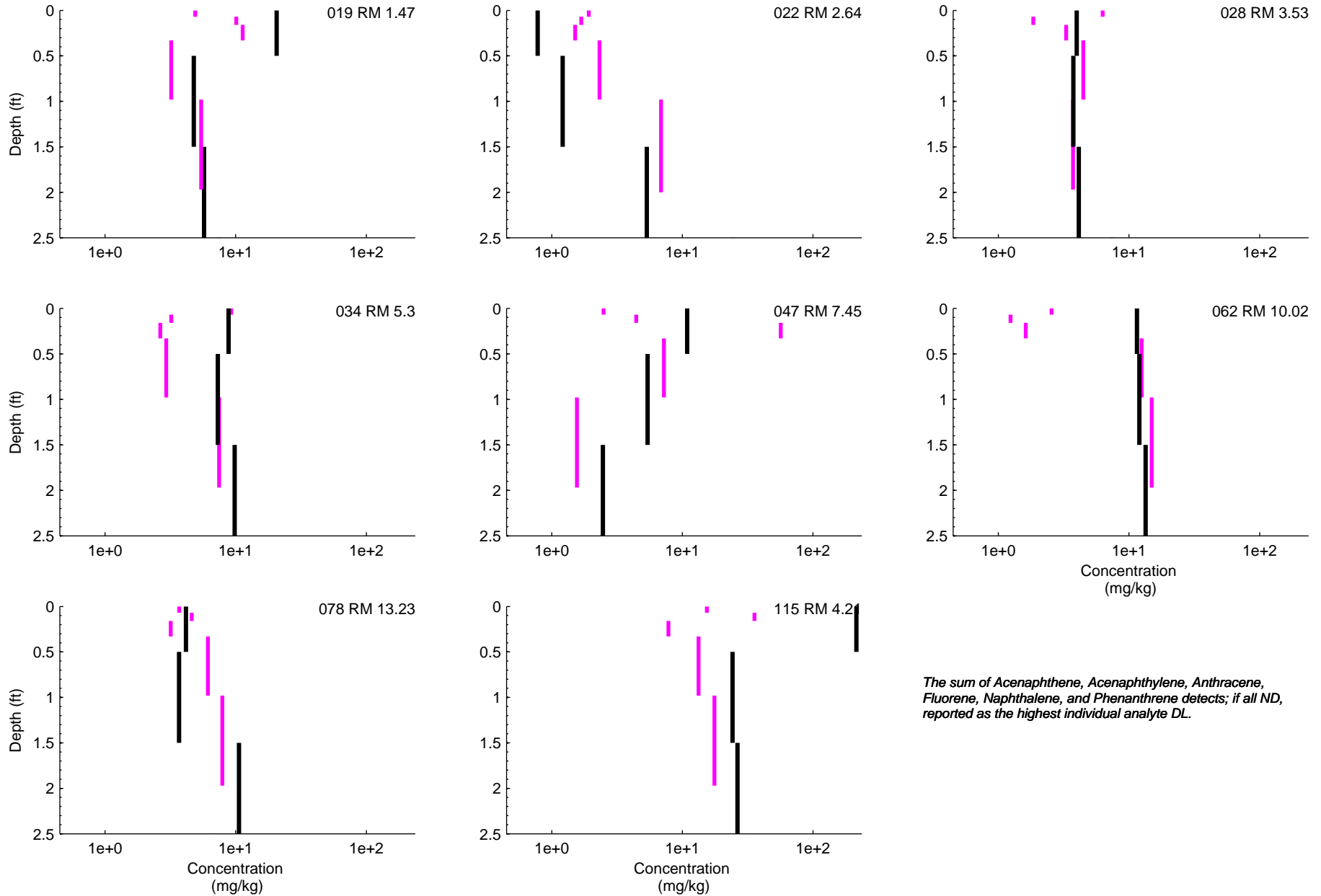


FIGURE 3–8.f Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations
Total DDx (mg/kg)

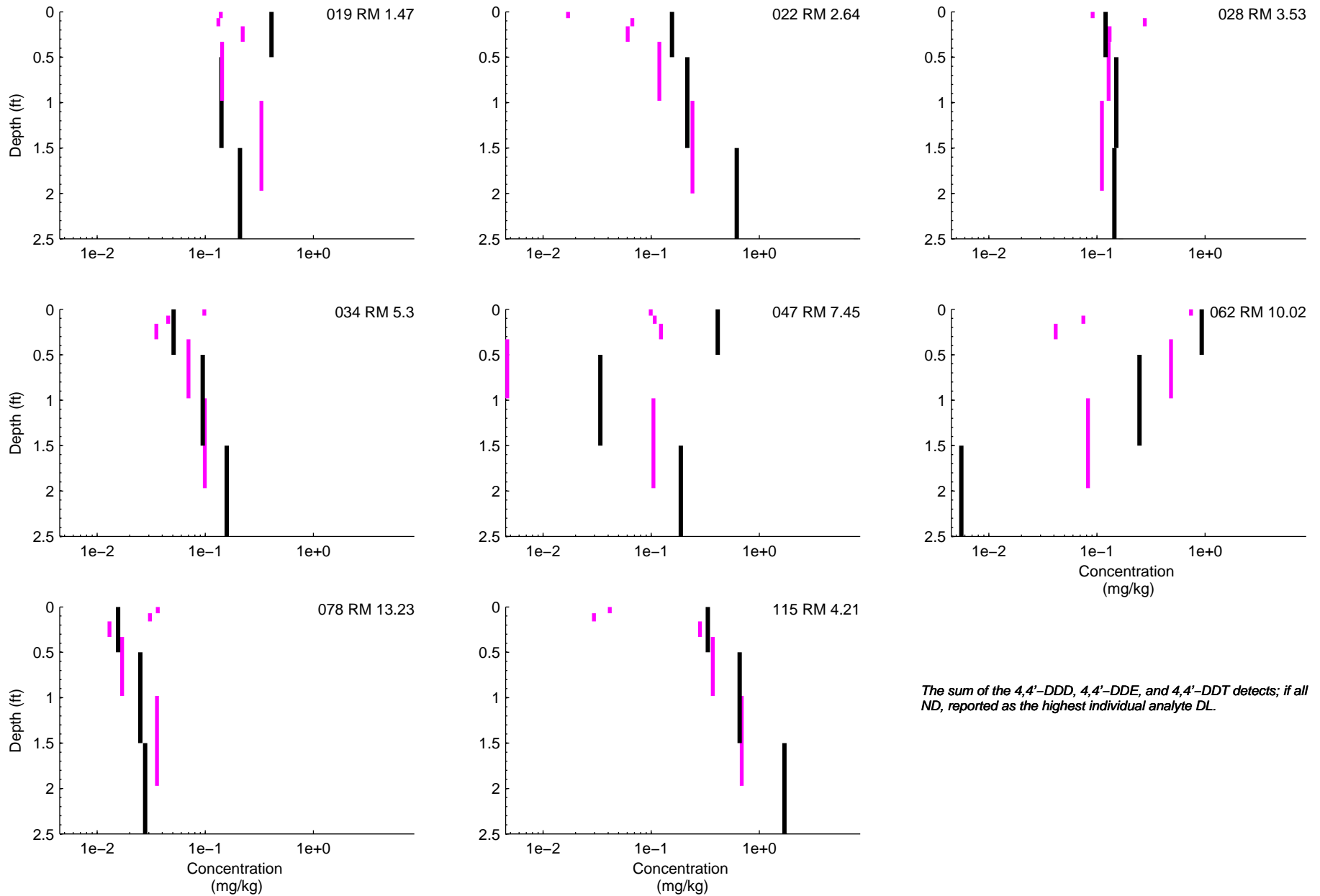


FIGURE 3–8.g Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations
Dieldrin (mg/kg)

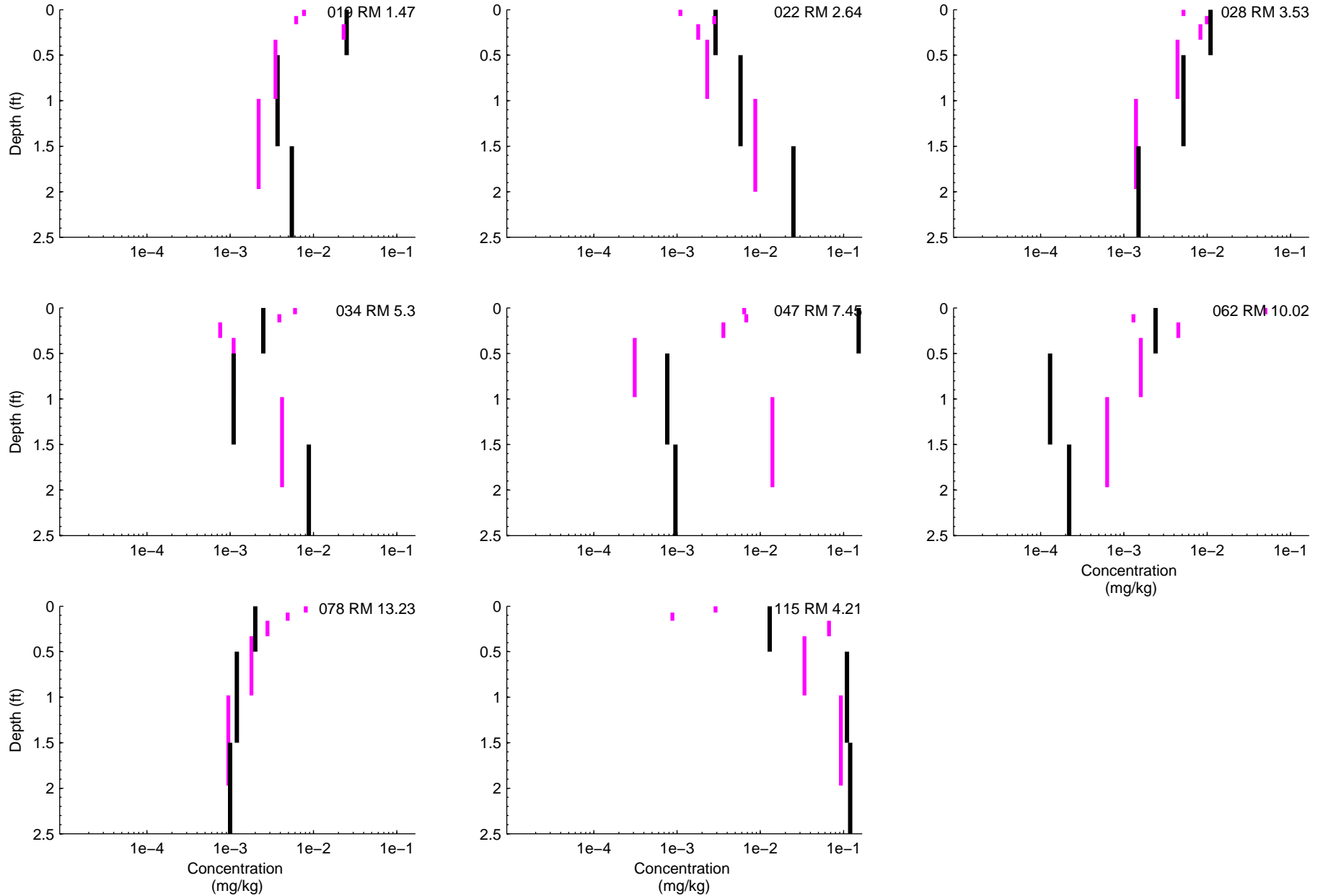


FIGURE 3–8.h Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations
Total Chlordane (mg/kg)

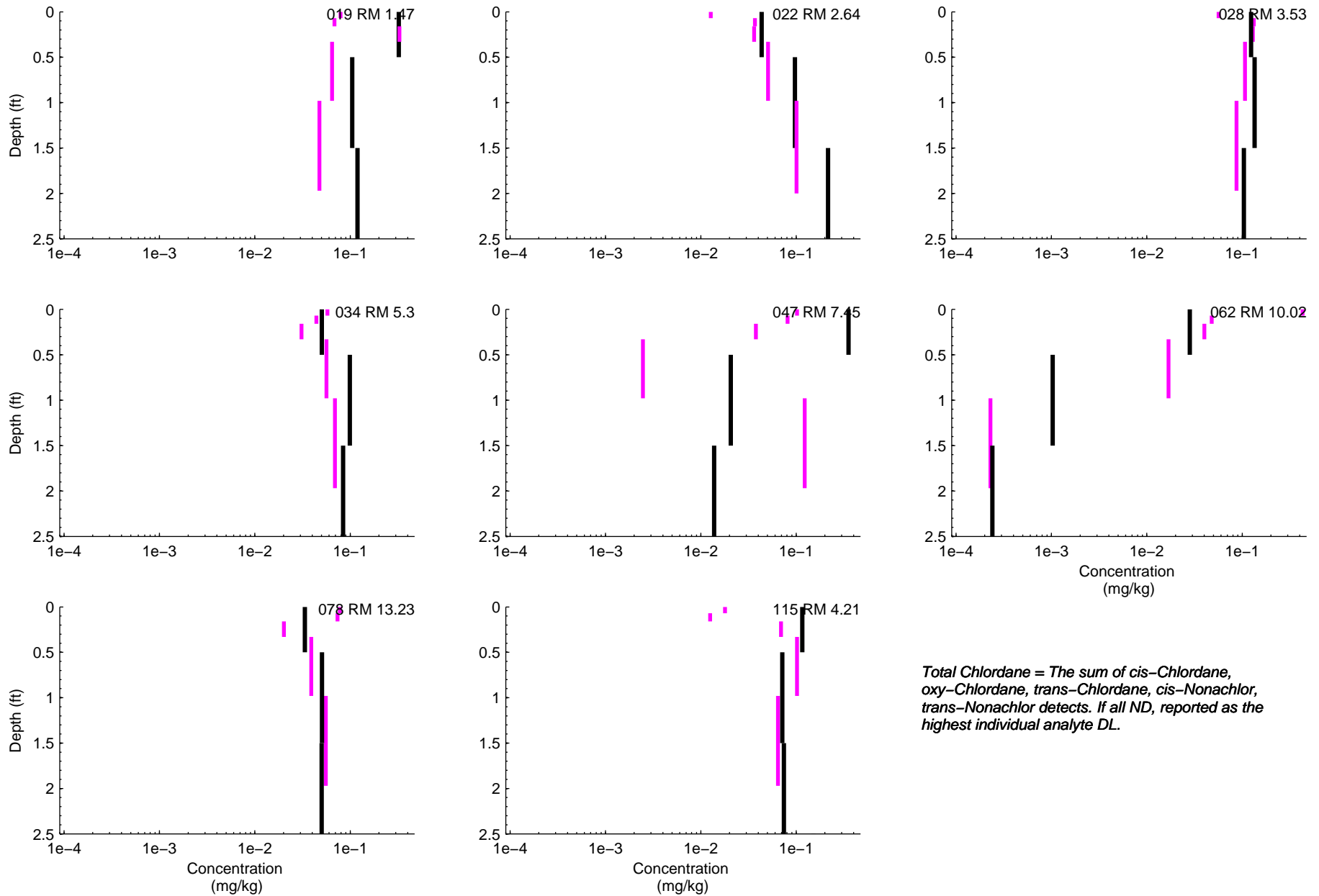


FIGURE 3–8.i Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations
Mercury (mg/kg)

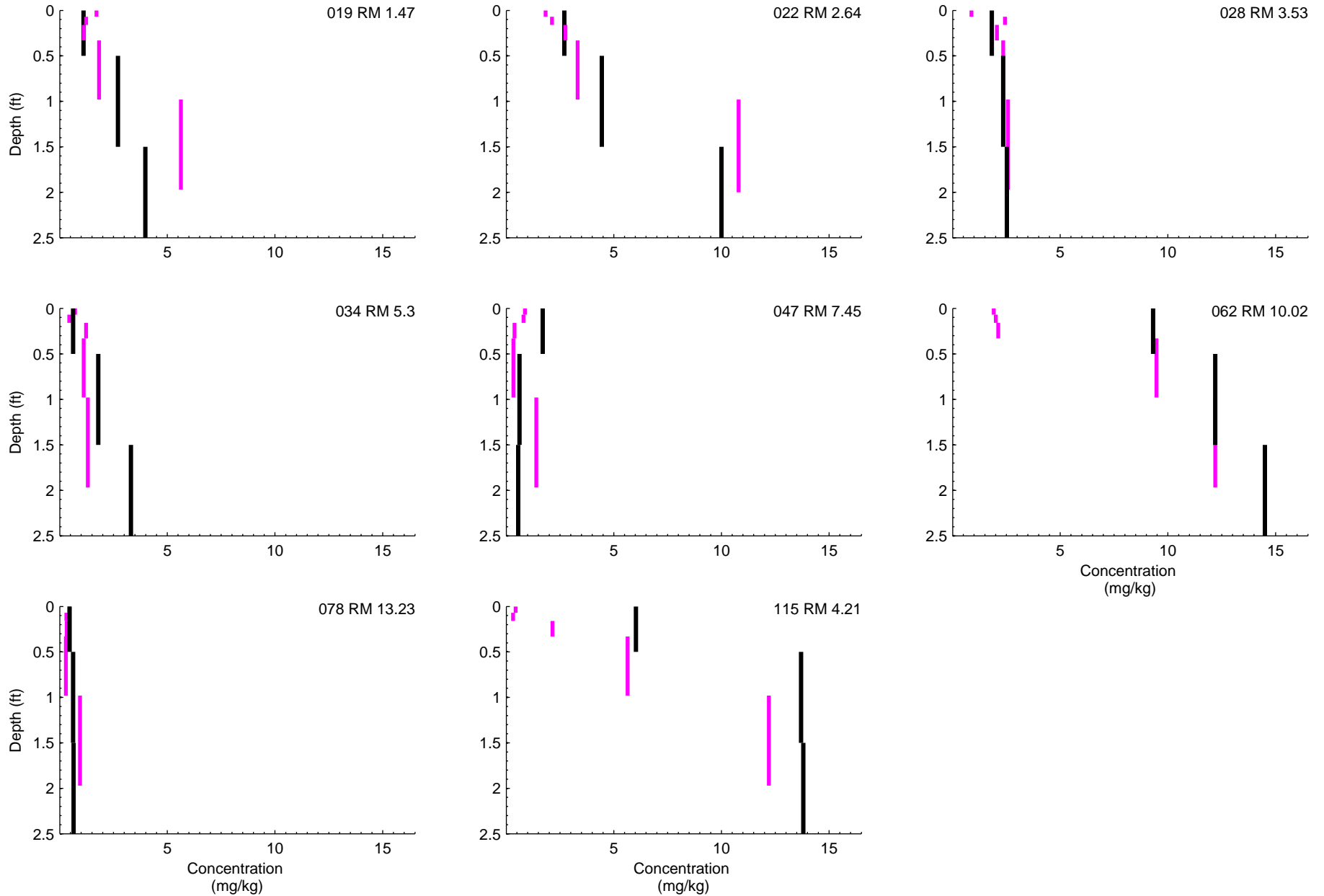


FIGURE 3–8.j Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations
Cadmium(mg/kg)

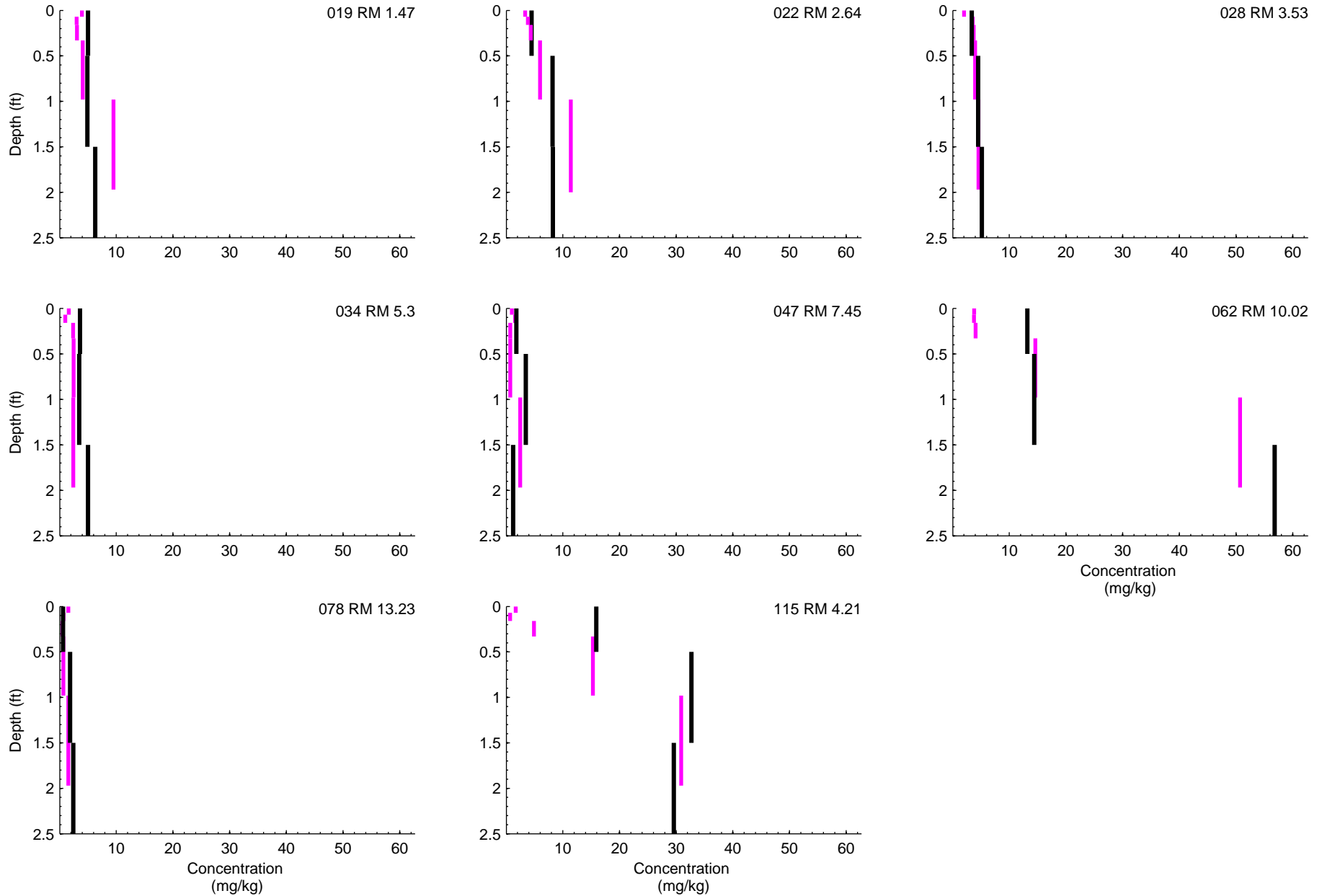


FIGURE 3–8.k Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations
Copper (mg/kg)

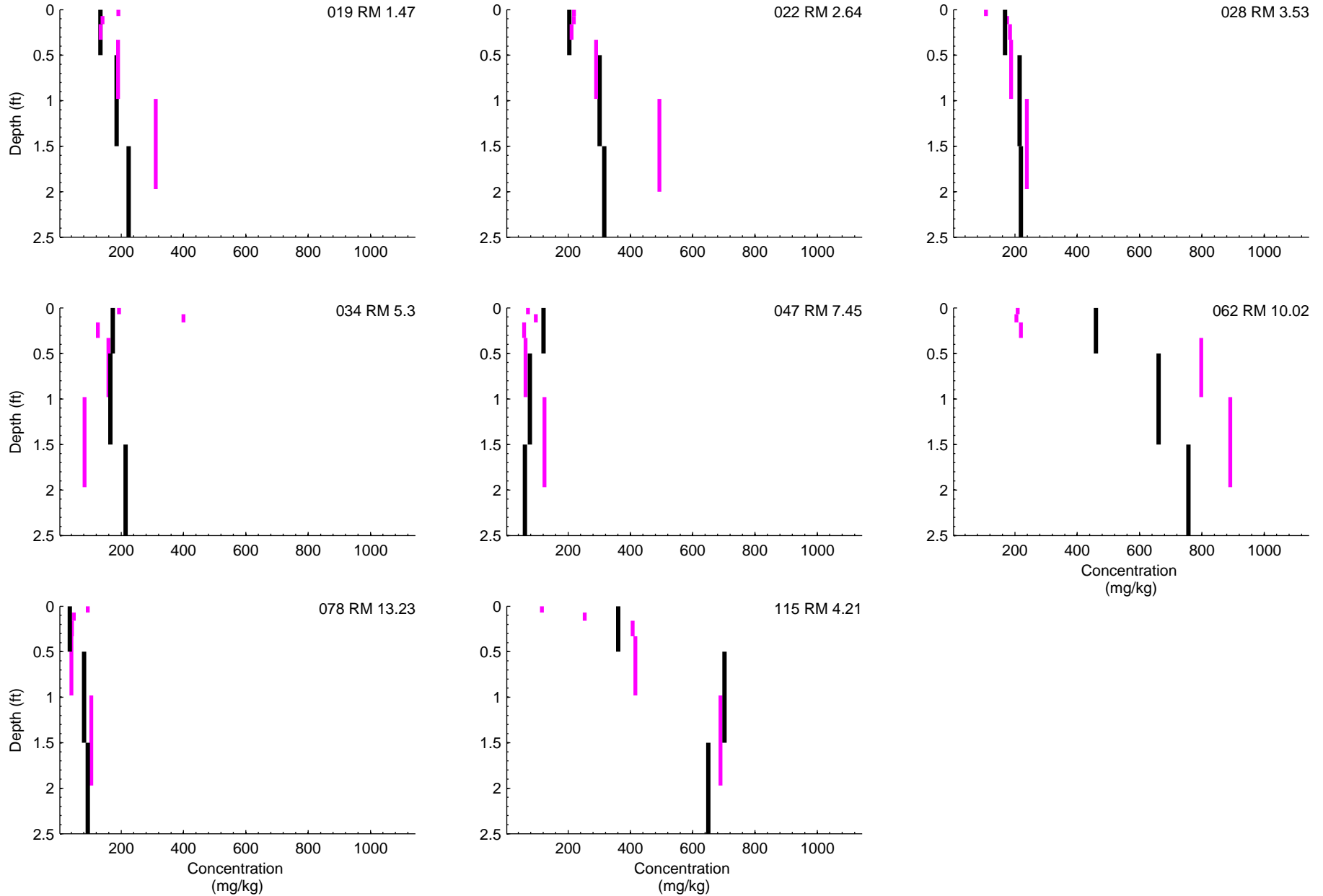


FIGURE 3–8.I Comparison of Colocated Group A and Group D (Finely Segmented) Concentrations
Lead (mg/kg)

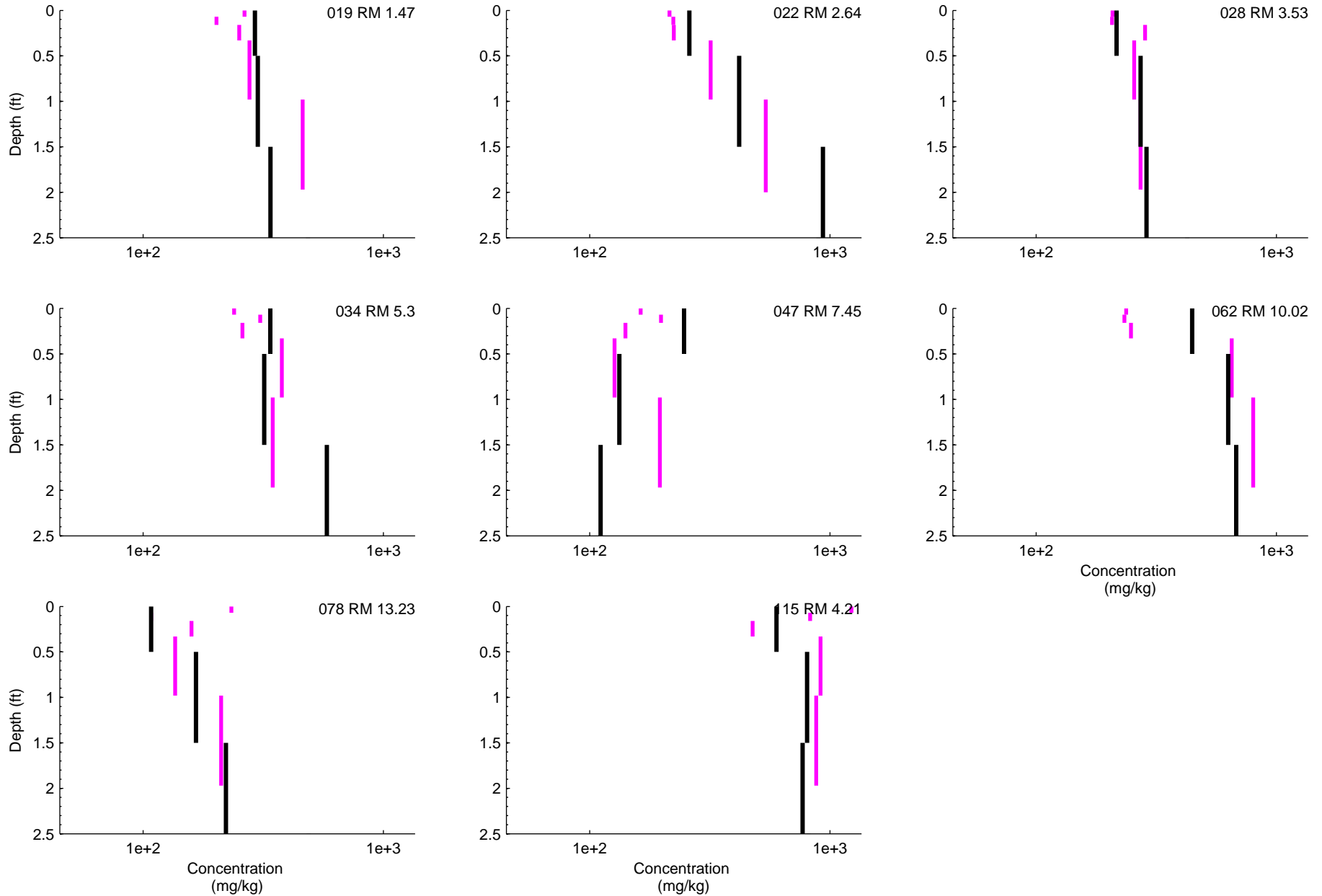
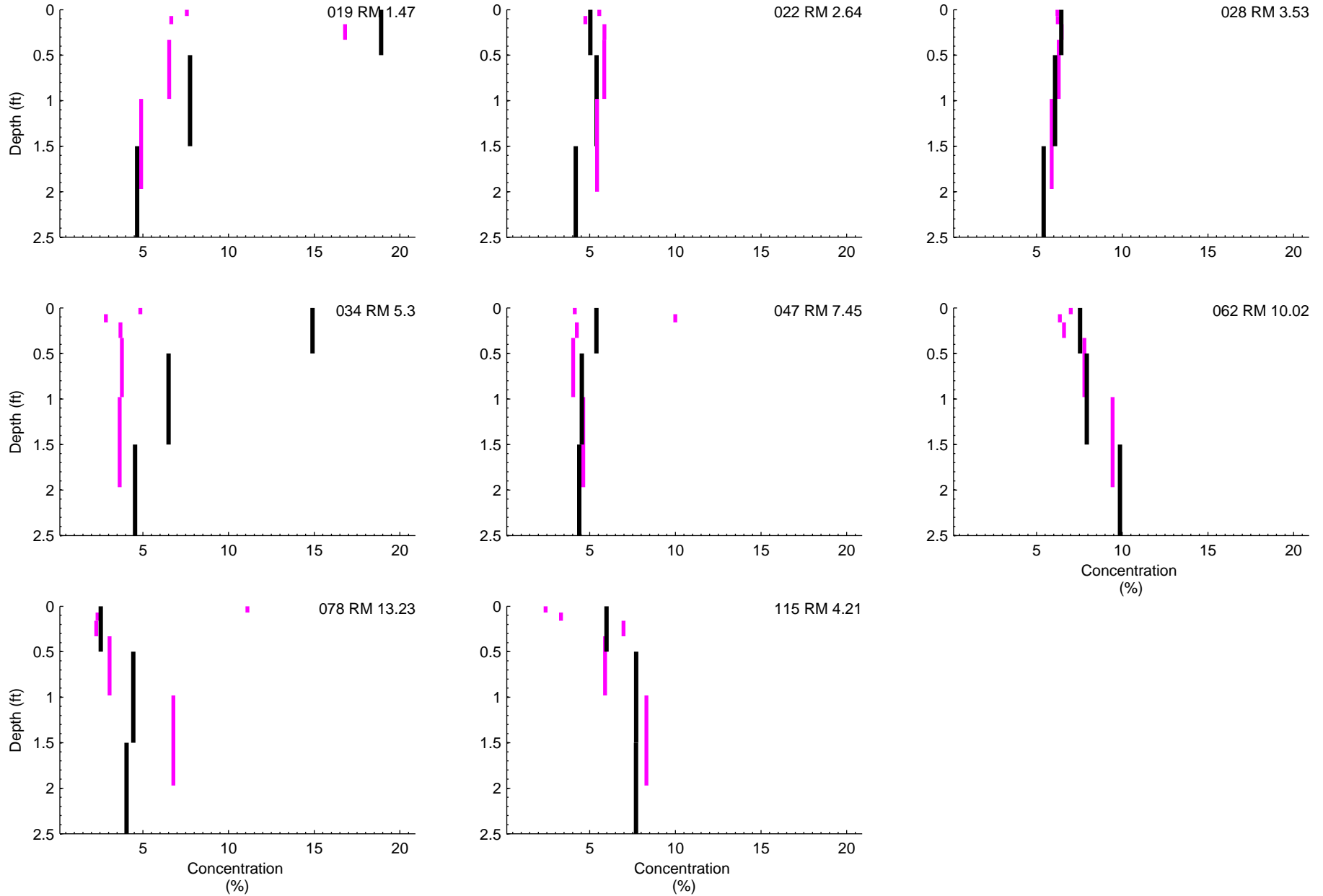


FIGURE 3–8.m Comparison of Colocated Group A and Group D (Finely Segmented)
Concentrations Total Organic Carbon (%)



4.0 Data Usability

The DQOs developed for the LRC program are presented in **Appendix A**. These DQOs established the level of data quality that was considered necessary to support the objectives of the study. This section describes the data usability assessment that was performed to verify the quality of the data generated during the LRC program and to evaluate its acceptability for use in site decisions. The data usability assessment was based primarily on the results of the data validation process described in Section 2.11.3. The validation consisted of two steps: verification of adherence to program specifications (QAPP, analytical methods, contractual documents), and an evaluation of the quality of the data in terms of precision, accuracy, representativeness, comparability, and completeness. These elements, referred to as data quality indicators (DQIs), were assessed by comparing the sample results generated during the LRC program to pre-established standards or criteria documented in the QAPP. Major deviations from established criteria resulted in the associated data being qualified with an “R” to indicate that the data were rejected and considered invalid for use in decision-making. Data associated with less significant variations were considered acceptable and appropriate for use, and were flagged with a qualifier (for example, with a “J” as estimated;); Region 2 data validation guidance does not provide a mechanism for assigning bias. Decisions as to the acceptance or rejection of data were based on USEPA Region 2 validation guidance where available; in the absence of Region 2 guidance, other validation guidance or professional judgment was used.

This section of the report is separated into three subsections: Section 4.1 discusses overall data usability of the sediment sample results with respect to the DQIs of precision, accuracy, representativeness, comparability, completeness, and sensitivity. Section 4.2 addresses the quality and usability of the data by analyte group. Section 4.3 summarizes the rejected data. **Appendix N** provides a summary table of DVRs previously submitted to USEPA along with the dates of submittal to USEPA, as well as a limited number of updated or recently completed DVRs in hard copy form. Note that the data usability evaluation focuses on the sediment sample results and does not include the aqueous QC samples (equipment rinsate blanks and trip blanks). Qualifications of the aqueous QC samples are discussed in the DVRs. Data for the QC samples, including any qualifiers that were applied, are presented in **Appendix P**.

Of the 368,946 reportable sediment data points generated during the LRC, 368,013 results, or 99.75 percent of the total number, are valid and acceptable for assessment purposes. Forty-seven percent of the valid data were accepted as reported by the laboratory, with no further qualification required; 53 percent of the valid data were qualified during the validation process. The most common reason for qualification was low percent solids (approximately 31 percent of the data were qualified during validation solely on the basis of percent solids). Qualification of this data as “estimated” is required under USEPA Region 2 validation rules when samples contain less than 50 percent solids, and rejection of data is required if a sample contains less than 10 percent solids. Only two data points were rejected on the basis of percent solids during validation. This USEPA Region 2 validation convention is based on the recognition that it may be difficult for both the sampler and the analyst to take a subsample that is truly representative of semisolid material. In addition, high levels of moisture can cause matrix interferences for many of the organic analytical techniques. Sediment samples, particularly surface samples, were expected to contain elevated levels of moisture. Therefore, sampling procedures (described in Chapter 2.0 of this report and the SOPs contained in Appendix B of the LRC QAPP [ENSR 2008a]) were designed to minimize the sample moisture content while maintaining the representativeness of the sample.

In addition to low percent solids, MS recoveries and surrogate recovery exceedances (high or low recoveries) were frequently cited as the basis for data qualification; both of these are indicative of potential matrix effects that were commonly cited by laboratories as presenting difficulty during the analytical program. Other common reasons for data qualification included calibration issues, EMPCs for HRGC/HRMS methods, equipment and laboratory blank contamination, and difficulty obtaining a

confirmatory chromatographic pattern match for PCB Aroclor analysis since weathering and degradation of the parent Aroclor makes qualitative identification uncertain for this compound group.

4.1 Data Quality Indicators

Data validation information was used to evaluate the overall quality of the LRC sampling and analysis programs through the DQIs of precision, accuracy, representativeness, comparability, completeness, and sensitivity. Each of these DQI parameters is discussed in sections below. **Figures 4-1 to 4-31** present for each analysis, summaries of all qualified and rejected sediment data for this project. **Figure 4-32** summarizes project completeness, that is, the amount of valid data obtained for each analyte.

4.1.1 Precision

Precision is the measure of agreement among repeated measurements of the same property under identical or substantially similar conditions and includes both field and analytical components. Overall, 99.99 percent of the data were usable based on precision criteria described in Worksheet #28 of the LRC QAPP (ENSR 2008a). Data that did not meet the criteria defined in the LRC QAPP (ENSR 2008a) were qualified; if data were rejected, it was consistent with USEPA Region 2 guidance.

Field precision was assessed through the collection and measurement of field duplicates and expressed as the RPD of the sample and field duplicate results. Field duplicates were collected from the same bowl of homogenized sediment and placed into a duplicate set of storage jars, with the exception of samples that were not homogenized (for example, VOCs and TPH-purgeables). Field duplicates for these samples were collected as discrete samples within close proximity to one another in the grab or core. Field duplicates were collected at a frequency that met or exceeded the goals established in the LRC QAPP (ENSR 2008a), with the exception of the one field duplicate proposed for ammonia, TKN, and phosphorus, which was not collected.

The field duplicate RPD results that were primary triggers for the application of validation qualifiers to individual analyte groups are discussed in Section 4.2. Less than 1 percent of all reportable sediment results were qualified as estimated on the basis of field duplicate results; only six data points were rejected. The rejected results were for mercury by Method 1631E, calcium by Method 6010B, and copper by Method 6020, which had ≥ 120 percent RPD in all cases. It should be noted that data validation guidance on precision is inconsistent. For inorganic parameters, such as mercury and other metals, USEPA Region 2 validation guidance requires rejection of data for RPD ≥ 120 percent, while there is no provision in the organic data validation guidance regarding an upper limit for field duplicate RPD exceedances that would result in rejection of data for organic parameters.

Laboratory precision was assessed through the RPD results for matrix duplicates, LCS/LCSD pairs, and MS/MSD pairs. Matrix duplicates and MS/MSD pairs do not reflect laboratory precision as effectively as LCS/LCSD pairs since sample heterogeneity may impact both matrix duplicate and MS/MSD precision. However, it should be noted that for the LRC data, no differentiation is made between RPD exceedances for matrix duplicates, LCS/LCSD, or MS/MSD precision. The percent of all reportable sediment results that was qualified as estimated on the basis of laboratory duplicate RPDs was 0.47 percent; 14 results (0.004 percent) were rejected. The rejected results were for metals analysis by Methods 6010B and 6020. These 14 results had ≥ 120 percent RPD between both values. As noted above in the discussion of field duplicate RPDs, USEPA Region 2 validation guidance has no upper limit for RPD exceedances that result in rejection for organic parameters, while Region 2 inorganic validation guidance requires rejection of data associated with RPD exceedances ≥ 120 percent RPD. The analyses for which laboratory duplicate RPD results (either LCS/LCSD, laboratory sample duplicates, or MS/MSD) caused the application of validation qualifiers are presented in Section 4.2.

Other laboratory precision indicators included:

- Results for PAHs by HRGC/LRMS-SIM from samples that required re-extraction due to initial results that exceeded the method calibration range were compared to the initial sample results. Less than 1 percent of the PAH results exceeded the 50 percent RPD goal for re-extraction precision and were, therefore, qualified as estimated (J). The need to use a reduced aliquot size may be a factor in exceedance of precision criteria. In particular, many PAH samples required reanalysis using a significantly smaller sample aliquot due to concentrations of some target analytes, which exceeded the calibration range of the method. The requirement for a smaller sample size can make it more difficult to obtain a representative sample and can, therefore, magnify differences in sample homogeneity.
- For methods that employed dual column analysis (butyltins, herbicides, pesticides by GC/ECD, and PCB Aroclors), 8 percent of the data generated by those methods were qualified as estimated (J) based on validation criteria for dual column precision. Less than 1 percent of the herbicide results were rejected due to dual column RPD exceedance of greater than 90 percent, as specified in the Region 2 validation guidance.

Overall, the precision objectives stated in LRC QAPP Worksheet #28 and Appendix C-2 (ENSR 2008a) were achieved. Approximately 2 percent of the reportable data points generated were qualified for reasons related to either field or laboratory precision, but these data points are considered valid and acceptable for use. Approximately 0.01 percent of the reportable sediment data points were rejected based on Region 2 data validation criteria for either field or laboratory precision.

4.1.2 Accuracy

Accuracy is the degree of agreement between an observed value and an accepted reference or true value. Overall, 99.75 percent of the results were considered acceptable and usable following comparison to accuracy criteria described in Worksheet #28 and Appendix C-2 of the LRC QAPP (ENSR 2008a). Data that did not meet the criteria defined in QAPP worksheets were qualified; if data were rejected, it was consistent with USEPA Region 2 guidance.

Laboratory accuracy was assessed using the recoveries of positive control samples (i.e., MS/MSD, LCS/LCSD, and surrogate spikes). **Table 4-1** shows that 0.36 percent of the total reportable sediment results were qualified as estimated for LCS/LCSD nonconformance; these data are considered acceptable for use. Only 0.0005 percent of the sediment data were rejected due to LCS/LCSD recovery being below the laboratory's lower control limit; this percentage represents two results for pesticides by GC/ECD. Validation guidance unique to pesticides requires rejection of data whenever an associated LCS/LCSD result falls below established control limits. As shown in **Table 4-1**, 0.30 percent of data points were qualified as estimated for MS/MSD recovery nonconformance. A Low MS/MSD recovery accounted for rejection of 0.05 percent of the data, including analyses for CN, pesticides by GC/ECD, metals (Methods 6010B and 6020), SVOCs, butyltins, VOCs, mercury, PCB Aroclors, Cr(VI), pesticide by HRGC/HRMS, herbicides, and TKN.

Surrogates are applicable to organic analysis only. The percent of results qualified as estimated due to surrogate recovery was 2.5 percent (**Table 4-1**). Low surrogate recovery (less than 10 percent) accounted for rejection of 0.009 percent of the data; the rejected data were all pesticide results generated using the GC/ECD method. Surrogate and MS recovery issues, unlike LCS recoveries, can be indicative of extraction difficulties or interferences from the sample matrix.

Additional measures of accuracy and frequency of qualification and rejection are shown in **Table 4-1**.

Accuracy also was indirectly addressed via the negative control samples for field activities (i.e., trip and equipment rinsate blanks, as well as laboratory negative control samples, such as method blanks). Trip blanks were submitted with VOC and TPH-purgeables shipments. Equipment blanks were collected

weekly. The percentages of results that were qualified as ND due to associated laboratory or equipment blank contamination were 1.3 percent and 1.1 percent, respectively. Four metals results (Method 6020) were rejected due to high equipment blank contamination (results were greater than the RL, but less than the concentration in the equipment blank). Ninety-four positive results for PAH by HRGC/LRMS-SIM were qualified as estimated due to missing method blank information. Two ND results for PAH by HRGC/LRMS-SIM were rejected due to missing method blank information. Sixty metals results (analyzed by Methods 6020 and 7740) were qualified as estimated due to negative blank contamination issues.

Overall, the accuracy objectives stated in LRC QAPP Worksheet #28 and Appendix C-2 (ENSR 2008a) were achieved; less than 0.2 percent of all reportable sediment results were rejected on the basis of accuracy measurements. Worksheet #12 provides an overall data completeness goal of ≥ 90 percent for each of the analyte groups. The remaining data are valid and acceptable for use.

4.1.3 Representativeness

Representativeness is a qualitative and quantitative measure of the degree to which data suitably represents a characteristic of a population, parameter variations at a sampling point, a process condition, or an environmental condition. Aspects of representativeness addressed during validation included the review of sample collection information in the COC documentation, conformity of laboratory analyses to the LRC QAPP, adherence of the documented laboratory procedures to method requirements, and completeness of the laboratory data packages. Most of the issues identified during this evaluation did not result in the qualification of laboratory data but did involve resubmittals of data by the laboratories to correct problems that were discovered during the validation process. All of these issues were resolved. Other aspects of data representativeness, such as adherence to recommended holding times, instrument calibration requirements, as well as field and laboratory precision assessments are discussed in Section 4.2.

The need to utilize small sample aliquot sizes for certain analyses to avoid reporting results over the highest calibration standard may have impacted the analyst's ability to obtain a representative sample aliquot in some instances. For the isotope dilution PAH and pesticide analyses, sample aliquots as small as 1 gram were required for some re-analyses to avoid calibration exceedances.

In accordance with the USEPA Region 2 validation guidance documents, samples that contained less than 50 percent solids were qualified as estimated. This requirement resulted in qualification of approximately 40 percent of the reportable sediment data during the LRC. Note that radiochemistry and TOC results were not qualified on the basis of percent solids since those analyses included a drying step. USEPA Region 2 validation guidance requires rejection of ND results if percent solids is less than 10 percent; only 2 sample results were qualified on the basis of this criterion.

4.1.4 Comparability

Comparability is a qualitative expression of the measure of confidence that two or more data sets may contribute to a common analysis and interpretation. Comparability of data within the investigation was maximized by using standard methods for sampling and analysis, reporting of data, and data validation. To the extent possible, the August 2005 MPI QAPP (MPI 2005c) was used as the basis for analytical method selection in order to ensure data comparability with previous sediment investigations. In general, standard Resource Conservation and Recovery Act program methods from SW-846 or other program-compliant method compendia were employed for all analyses, with the exception of methods for which no SW-846 method exists (e.g., specialty analyses, some general chemistry, and radiochemical parameters). In these cases, alternate USEPA or other accepted methods were used. To eliminate interlaboratory variability, specific analytical methods were assigned to each laboratory for the duration of the project.

Analyses for each parameter were confined to a single laboratory, with the exception of TPH-extractables. These analyses were moved from the TestAmerica-Edison laboratory to the TestAmerica-South Burlington laboratory after approximately 1 month of sampling. Comparability issues related to the TPH-extractables analysis are discussed in detail in Sections 2.10.6 and 4.2.18.

Chlorinated pesticide analyses were performed by both the HRGC/HRMS method and the standard SW-846 dual column GC/ECD Method 8081A. PAHs were analyzed as a subset of SVOCs by Method 8270C and by the HRGC/LRMS SIM isotope dilution method. PCBs were analyzed both as Aroclors (SW-846 Method 8082) and as congeners (USEPA Method 1668A). For all of these analyses, the HRMS and isotope dilution procedures offer greater sensitivity, improved accuracy, and enhanced compound identification.

Metals analyses were performed using either Inductively Coupled Plasma/Atomic Emission Spectrometry (ICP/AES) or ICP/MS, with the exception of mercury. Results from ICP/AES and ICP/MS are regarded as comparable by USEPA, although the ICP/MS is generally more sensitive. A limited number of samples were analyzed by GFAA due to matrix-specific QC problems with the ICP/MS method, as discussed in Section 2.10.1.

4.1.5 Completeness

Completeness is a measure of the amount of valid data obtained from a measurement system, expressed as a percentage of the number of valid measurements that were or should have been collected. Valid data are defined as all data points judged to be usable (i.e., not rejected as a result of the validation process).

Field completeness is defined as the percentage of samples actually collected versus those intended to be collected per the LRC QAPP (ENSR 2008a). The planned total number of samples to be submitted to the laboratories was 14,606 (ENSR 2008a). The actual number of samples processed and sent to laboratories was 15,549, or 106.5 percent (note that the LRC QAPP did not include locations 2008-CLRC-116, 117, and 118). The goal stated in the LRC QAPP was greater than 95 percent field completeness. On a location basis, sampling was completed at 110 of the planned 118 stations, or at 93 percent completeness. Three of the remaining 8 stations that could not be cored were abandoned due to either access or safety concerns; attempts were made at all other locations in accordance with acceptance criteria defined in the LRC QAPP (ENSR 2008a) (97 percent of the locations). Detailed information on sampling completeness is provided in Section 2.7.1.2.

Laboratory completeness is defined as the percentage of valid data points versus the total expected from the laboratory analyses. Valid data points are those that have not been rejected during the validation process. The objective stated in the LRC QAPP for this project was greater than 90 percent laboratory completeness. **Figure 4-32** summarizes laboratory completeness based on data validated for each method. Overall laboratory completeness was 99.75 percent (368,013 valid and acceptable results out of 368,946 total reportable sediment results). Individual parameters that did not meet the 90 percent completeness goal were CN (88 percent) and Cr(VI) (82 percent). Cr(VI) can be reduced to the trivalent form of the element in the presence of reducing species, making it difficult to recover the matrix spikes, which are an indicator of data quality. Section 1.3 of USEPA Method 7199 (USEPA 1986) states, "Samples containing high levels of organics or sulfides cause rapid reduction of soluble Cr(VI) to Cr(III)." Section 3.1 of USEPA Method 3060A, which is the sample preparation method used for the determination of Cr(VI) via either USEPA Method 7196A or USEPA Method 7199, notes that it is appropriate to determine the reducing/oxidizing tendency of each sample using additional analyses such as pH, ferrous iron, sulfides, and oxidation reduction potential, which can be used to establish the tendency of Cr(VI) to exist or not exist in the unspiked samples and assists in the interpretation of QC data for matrix spike recoveries, which are outside generally accepted criteria for total metals. Organic content and sulfide also can interfere with the determination of cyanide and Cr(VI) in spite of sample pretreatments designed to reduce these interferences. All other individual analytical fractions exceeded the laboratory completeness goal.

4.1.6 Sensitivity

Sensitivity is the ability of a method or instrument to discriminate between measurement responses representing varying levels of the analyte of interest; in particular, the capability of measuring a constituent at low levels. For the USEPA methods employed in this project, sensitivity was measured by the Method Detection Limit (MDL) (or estimated detection limit [EDL] for isotope dilution methods) and Quantitation Limit (QL). Both nominal MDLs and QLs were provided by the analytical laboratories in their analytical report and were verified during validation. All RLs, both MDL (or EDL) and QL, were corrected by the laboratory for sample-specific factors, such as exact aliquot size, dry weight for soils, and dilutions. The laboratories were instructed to report estimated (J) results if concentrations were above the MDL/EDL but below the QL.

The LRC QAPP (ENSR 2008a) provides the project data quality levels (DQLs) and achievable laboratory limits. In general, the methods selected were sufficiently sensitive to meet the project DQLs. Those methods that could not meet the project DQLs were identified in the LRC QAPP. During validation, the actual laboratory QLs also were compared to the achievable laboratory limits shown in the LRC QAPP. Without dilution, all analytes met the QL goals shown in the QAPP, with the exception of TOC, TPH-extractables, and Cr(VI). The TOC RL listed in the LRC QAPP was incorrect; the RL for TOC should have been 0.05 percent, or 500 mg/kg, not 0.5 mg/kg as listed in the LRC QAPP. With this correction, TOC data met the sensitivity goal expected using the referenced method.

The discrepancy in the RL for TPH-extractables is related to the decision to move this analysis from TestAmerica's Edison, New Jersey, laboratory to the TestAmerica laboratory in South Burlington, Vermont, which was discussed in Section 2.10.6. The RL for TPH-extractables using the procedure in place at the Edison, New Jersey laboratory was 6.5 mg/kg; however, the RL for TPH-extractables at the South Burlington laboratory was 22 mg/kg. The LRC QAPP was not updated to reflect this change when the decision was made to change laboratories. Since almost all results showed detectable levels of TPH-extractables, this change is not considered significant.

The QL reported for Cr(VI) using the ion chromatography method was approximately twice the QL goal specified in the LRC QAPP. The project DQL (0.01 mg/kg, which was based on the lower of the DQL) and Sediment RL was significantly lower than the sensitivity achievable by either of the commonly used methods for Cr(VI), USEPA Methods 7196A and 7199. However, based on information provided in USEPA methods, the ion chromatography method (7199) was selected for use as a means of mitigating some of the interferences that were likely to impact the colorimetric procedure. Although Method 7199 offers better sensitivity than the colorimetric procedure, particularly in complex matrices it could not meet the Project QL goal. The laboratory consistently reported raw data for Cr(VI) to the LRC QAPP QL of 0.4 mg/kg, which, as noted in footnote e of Worksheet #15, was based on wet weight; when results were corrected for actual sample percent solids the final sample RL was elevated.

4.2 Analyte-specific Assessment of Usability

The following paragraphs describe the qualifications applied to sediment samples for each analyte group analyzed for the LRC program and identify the major reasons for sediment data validation. As noted earlier, this discussion and associated **Figures 4-1** through **4-31** apply only to the sediment sample qualifications and do not address qualification of aqueous QC samples such as equipment blanks and trip blanks. However, the results of equipment blanks and trip blanks are included in the DVRs, which are part of **Appendix N**. Qualified data for these QC samples are presented in **Appendix P**.

4.2.1 AVS/SEM

All data associated with AVS/SEM analyses are considered valid and acceptable for assessment purposes; no data were rejected. For AVS and SEM the primary reason for data qualification was low percent solids; detect and ND results for the affected samples were qualified as estimated (J/UJ). The basis and frequency of all qualification are shown in **Figures 4-1, 4-2, and 4-3**.

4.2.2 Butyltins

More than 99 percent of the butyltin data points generated during the LRC are valid and acceptable for assessment purposes. **Figure 4-4** shows the percentage by reason for qualification of butyltin sample results. As with most analytical fractions, low percent solids was the most frequent reason for application of data qualifiers; detect and ND results for the affected samples were qualified as estimated (J/UJ). Other reasons for the qualification of butyltin results are shown in **Figure 4-4**. All qualifications, except for percent solids, were applied at a frequency of less than 5 percent. Less than 1 percent of the data points were rejected. These data were rejected due to extraction holding time exceedances or MS recovery associated with ND values. The rejected data are summarized in Section 4.3.

4.2.3 PCDDs/PCDFs

All PCDDs/PCDFs data points generated during the LRC are valid and acceptable for assessment purposes; no data were rejected. **Figure 4-5** shows the percentage by reason for qualification of PCDDs/PCDFs sample results. Low percent solids were the most frequent reason for application of data qualifiers; detect and ND results for the affected samples were qualified as estimated (J/UJ). Other reasons for qualification are shown in **Figure 4-5**. All qualifications, except for low percent solids, were applied at a frequency of less than 5 percent.

4.2.4 General Chemistry

Figures 4-6 through **4-11** summarize the percentage by reason for qualification of general chemistry results. A list of the parameters and a brief discussion of issues identified during validation are given below.

- **Ammonia.** All data points generated for ammonia are valid and acceptable for assessment purposes; no data were rejected. Ammonia data were qualified only for low percent solids; detect and ND results for the affected samples were qualified as estimated (J/UJ). Qualification of ammonia data by reason is shown in **Figure 4-6**.
- **CN.** Eighty-eight percent of CN data points are valid and acceptable for assessment purposes. The major reasons for qualification of the data as estimated were MS recovery and low percent solids. MS recoveries caused the rejection of 12 percent of the CN data. Sulfides and other sulfur-containing compounds are known to interfere with the analytical procedure for CN and this interference may not be entirely eliminated by modifications to the distillation procedure if the sulfide concentration is significant. Qualification of CN data by reason is shown in **Figure 4-7**.
- **Phosphorus.** All data points generated for phosphorus are valid and acceptable for assessment purposes; no data were rejected. As with most analytical fractions, the main reason for qualification of phosphorus data was low percent solids; results for the affected samples were qualified as estimated (J/UJ). Qualification of phosphorus data by reason is shown in **Figure 4-8**.
- **Sulfide.** All data points generated for sulfide analysis are valid and acceptable for assessment purposes; no data were rejected. The primary reason for qualification was low percent solids; detect and ND results for the affected samples were qualified as estimated (J/UJ). Qualification of sulfide data by reason is shown in **Figure 4-9**.
- **TKN.** Ninety percent of the TKN data are valid and acceptable for assessment purposes. Low percent solids were the primary reason for qualifying TKN data as estimated (J); all qualifications by reason are shown in **Figure 4-10**. One data point was rejected due to a low MS recovery. Rejected data are summarized in Section 4.3.
- **TOC.** All data points generated for TOC are valid and acceptable for assessment purposes; no data were rejected. Holding time was the main reason for qualification of TOC data and resulted in the data for the affected samples being qualified as estimated; additional qualification by reason is shown in **Figure 4-11**. It should be noted that percent solids criteria were not applied

to TOC because the Lloyd Kahn method requires that the sample be dried prior to analysis; therefore, sample results were not subject to qualification on the basis of low percent solids.

4.2.5 Geotechnical

All data generated for grain size, Atterberg Limits, and specific gravity are considered valid and acceptable for assessment purposes; no data were rejected. **Figure 4-12** summarizes the qualification by reason applied to grain-size results; no qualifiers were applied for Atterberg limits or specific gravity.

4.2.6 Herbicides

Ninety-nine percent of the data points generated for herbicides are considered valid and acceptable for assessment purposes. **Figure 4-13** shows the summary of validation qualifiers applied by reason to herbicide sample results. Low percent solids were the most frequent reason for qualification; detect and ND results for the affected samples were qualified as estimated (J/UJ). Other reasons for qualification, as shown in **Figure 4-13**, were applied at a frequency of less than 5 percent. One percent of the data points were rejected; these data points were rejected due to dual column RPD or MS recovery. The rejected data are summarized in Section 4.3.

4.2.7 Cr(VI)

Eighty-two percent of the Cr(VI) data are valid and acceptable for assessment purposes. **Figure 4-14** summarizes the validation qualifiers applied by reason to Cr(VI) results. The primary reasons for qualification of the data as estimated (J/UJ) were MS recovery and low percent solids; additional reasons for qualification are shown in **Figure 4-14**. Two data points were rejected due to MS recovery. Difficulty was encountered due to the reducing nature of most sample matrices, which resulted in loss of the matrix spike. As recommended by USEPA Method 3060A (USEPA 1986), additional analyses, such as pH and oxidation reduction potential, were used to establish the tendency of Cr(VI) to persist in unspiked samples and assist in the interpretation of QC data that were outside the generally accepted criteria for metals. The presence of organics and sulfide also can present interferences to this method, as noted in Section 1.3 of USEPA Method 7199. Rejected data are discussed in Section 4.3.

4.2.8 Mercury and Methyl Mercury

Approximately 99 percent of the mercury data, and all of the methyl mercury results, are valid and for assessment purposes. **Figures 4-15** and **4-16** summarize the validation qualifiers applied to the mercury and methyl mercury results, respectively. The most common reason for qualification of mercury and methyl mercury data was low percent solids; detect and ND results for affected samples were qualified as estimated (J/UJ). Other reasons for qualification of mercury and methyl mercury are shown by reason in **Figures 4-15** and **Figure 4-16**, respectively. Five mercury data points (less than 1 percent) were rejected due to MS recovery and field duplicate RPDs. The rejected data are discussed in Section 4.3.

4.2.9 Metals

More than 99 percent of the data points generated using ICP/AES (Method 6010B) and ICP-MS (Method 6020), and all of the selenium data points by GFAA techniques (Method 7740), are valid and acceptable for assessment purposes. **Figures 4-17**, **4-18**, and **4-19** summarize the validation qualifiers applied to metals results by reason determined using Methods 6010B, 6020, and 7740, respectively.

For metals analyzed using Method 6010B, low percent solids was the most frequent reason for application of data qualifiers; detect and ND results for the affected samples were qualified as estimated (J/UJ). Other reasons for data qualification are shown in **Figure 4-17**. All qualifications, except for low percent solids, were applied at a frequency of less than 5 percent. Less than 1 percent of the data points were rejected; these data were rejected due to calibration, low percent solids, MS recovery, or laboratory or field duplicate RPDs. The rejected data are discussed in detail in Section 4.3.

For metals analyzed using Method 6020, low percent solids was the most common reason for qualification; detect and ND results for the affected samples were qualified as estimated (J/UJ). Other reasons for data qualification are shown in **Figure 4-18**. All qualification, except for low percent solids and laboratory duplicate RPDs, were applied at a frequency of less than 5 percent. Less than 1 percent of the data points were rejected; these data points were rejected due to MS recovery, ICS results, laboratory or field duplicate RPDs, or equipment blank contamination. The rejected data are discussed in Section 4.3.

For metals analyzed for selenium using Method 7740, negative laboratory blank contamination was the most common reason for qualification; ND results were qualified as estimated (UJ) in the case of negative blank contamination), detected results were qualified as estimated (J). Other reasons for data qualification of selenium are shown in **Figure 4-19**. No selenium data were rejected.

4.2.10 PAHs by HRGC/LRMS-SIM

More than 99.9 percent of the data points generated for PAHs by HRGC/LRMS-SIM are valid and acceptable for assessment purposes. **Figure 4-20** shows the summary of reason for data qualifiers applied to PAH sample results. Low percent solids were, again, the most frequent reason for application of data qualifiers; detect and ND results for the affected samples were qualified as estimated (J/UJ). Another frequent reason for qualification was EMPC. Alkylated PAH results were all flagged as estimated (J) and designated as EMPCs because the exact ion ratios and individual component retention times could not be specified for these complex mixtures (see discussion in Section 2.10.2).

A qualification unique to PAHs was based on the RPDs between results from samples requiring re-extraction due to initial results that exceeded the method calibration range and the initial sample results. This issue is discussed in detail in Section 4.1.1.

All qualifications are shown in **Figure 4-20** and, except for low percent solids and EMPCs, were applied at a frequency of less than 5 percent. Two data points (less than 0.1 percent) were rejected due to missing method blank information. The rejected data are summarized in Section 4.3.

4.2.11 PCB Aroclors

More than 99.9 percent of the PCB Aroclor data points are valid and acceptable for assessment purposes. A summary of the reasons for the application of validation qualifiers for PCB Aroclor results is shown in **Figure 4-22**. Unlike most other analytical fractions, surrogate recovery (rather than low percent solids) was the most frequent reason for qualification and resulted in estimated detect and ND results (J/UJ). Other reason codes for qualification are shown in **Figure 4-22**. Three data points, or less than 0.1 percent of the data, were rejected; these data were rejected on the basis of matrix spike recovery. The rejected data are summarized in Section 4.3.

Aroclor pattern recognition in the sediment sample extracts was compromised by the presence of overlapping Aroclors and significant weathering of the PCBs present in the sample. The chromatographic pattern match of identified Aroclors to reference Aroclors was poor in all data packages subject to full data validation. Therefore, all detected Aroclor results in both full and limited data validation efforts were qualified as estimated and flagged as JN to indicate PCB Aroclors are tentatively identified. Both the qualitative identification and quantitation of the Aroclors are uncertain due to poor pattern match with laboratory reference materials.

4.2.12 PCB Congeners

More than 99.9 percent of the data points generated for PCB congeners are valid and acceptable for assessment purposes. **Figure 4-23** shows a summary of the reason for the application of validation qualifiers to PCB congener sample results. Low percent solids were the most frequent reason for qualification; detect and ND results associated with the affected samples were qualified as estimated

(J/UJ). Other reasons for qualification are shown in **Figure 4-23**. All qualifications, except low percent solids and EMPCs, were applied at a frequency of less than 5 percent. Three data points (less than 0.1 percent) were rejected; these data were rejected due to labeled compound recovery. The rejected data are summarized in Section 4.3.

4.2.13 Pesticides by GC/ECD

Approximately 99 percent of the data generated for pesticides by GC/ECD are considered valid and acceptable for assessment purposes. The reasons for the application of validation qualifiers to these pesticide sample results are summarized in **Figure 4-24**. Unlike most other analytical fractions, elevation of the RLs due to chromatographic interference (rather than low percent solids) was the most frequent reason for application of a data qualifier; the affected ND results were qualified as estimated (UJ). Determination of pesticides by GC/ECD was impacted by the presence of PCBs and other ECD active compounds. The other primary reason for qualification was low percent solids; detect and ND results for the affected samples were qualified as estimated (J/UJ). All qualification is shown in **Figure 4-24**. Approximately 1 percent of the data points were rejected; rejection was due to holding time, surrogate recovery, MS recovery, and LCS recovery. The rejected data are summarized in Section 4.3.

4.2.14 Pesticides by HRGC/HRMS

More than 99 percent of the data generated for pesticides using the HRGC/HRMS method are valid and acceptable for assessment purposes. **Figure 4-25** shows the summary of validation qualifiers by reason applied to pesticides analyzed by HRGC/HRMS. As with most analytical fractions, low percent solids were the most frequent reason for qualification; detect and ND results for the affected samples were qualified as estimated (J/UJ). In order of frequency, the second most frequent reason for qualification was EMPCs.

Significant mass spectral and chromatographic interferences occurred in the analysis of methoxychlor. Interfering compounds sharing the exact masses as methoxychlor either coeluted or closely preceded the position of methoxychlor peaks in all samples where both ions were detected at the proper retention time. Ion ratios failed the method criteria in almost all cases. The laboratory attempted to conservatively estimate the highest possible concentration of methoxychlor in each sample and qualified the results as EMPCs. After validation of all the HRMS pesticide results was complete, an analysis of the methoxychlor data problems resulted in a decision to qualify all the positive methoxychlor results in all LRC sediment samples as presumptively present (JN).

All qualification reason codes are shown in **Figure 4-25**. Less than 0.2 percent of the data points were rejected; these data were rejected due to labeled compound or MS recovery, which was below 10 percent. The rejected data are summarized in Section 4.3.

4.2.15 Radiochemistry

All data points generated for isotopes analyzed by alpha spectroscopy (Pb-210, determined as Po-210) and by gamma spectroscopy (Be-7, Cs-137, K-40, and Ra-226) are considered valid and acceptable for assessment purposes; no data were rejected. The validation qualifiers applied by reason to radiochemistry data are summarized in **Figure 4-26** (alpha isotopes) and **Figure 4-27** (gamma isotopes). The primary reason for data qualification (J/UJ) was relative uncertainty in the measured value. This qualification indicates that the result's combined standard uncertainty was greater than the established method uncertainty of 30 percent. Other reasons for qualification, which occurred less frequently, are summarized in **Figure 4-26** and **Figure 4-27**. As discussed previously, percent solids criteria were not applied to radiochemistry results.

4.2.16 SVOCs

More than 99 percent of data points generated for SVOCs are considered valid and acceptable for assessment purposes. **Figure 4-28** summarizes the reasons for validation qualifiers applied to SVOCs. Low percent solids were the most frequent reason for qualification; detect and ND results for the affected samples were qualified as estimated (J/UJ). Other reasons for qualification are shown in **Figure 4-28**. Approximately 0.1 percent of the data were rejected due to holding time or MS recovery. The rejected data are summarized in Section 4.3.

4.2.17 TPH-extractables

Ninety-nine percent of the TPH-extractables data were considered valid and acceptable for assessment purposes. **Figure 4-29** summarizes the validation qualifiers applied to TPH-extractables sample results. As with most analytical fractions, the most frequent reason for qualification was low percent solids; detect and ND results were qualified as estimated (J/UJ). Other reasons for qualification are shown in **Figure 4-29**. Approximately 1 percent of the data were rejected due to holding time. The rejected data are summarized in Section 4.3.

As discussed in Section 2.10.6, samples were analyzed by both TestAmerica-Edison and TestAmerica-South Burlington. TestAmerica-Edison and TestAmerica-South Burlington were both certified by NJDEP for the LRC QAPP specified method for the determination of TPH Extractables. Initial analyses were performed by the Edison laboratory, but a decision was made to move this analysis to the South Burlington laboratory a few weeks into the sampling program. This decision was based on the corrective action response provided by the Edison laboratory to a review of their performance evaluation results. The South Burlington laboratory provided their SOP and confirmed that they followed the NJDEP method. As a QC measure, 20 percent of the samples analyzed by Edison were resubmitted (with new IDs) to the South Burlington laboratory for analysis. When discrepancies were noted between some results, both laboratories were interviewed to determine the source of the differences; at that time, South Burlington was found to use a methylene chloride/acetone solvent mix for extraction rather than the methylene chloride stated in the NJDEP method and used by the Edison laboratory. The NJDEP states that the method is performance based and modifications are permitted; the South Burlington SOP states that samples should be prepared using an "appropriate matrix specific extraction technique." Based on the results from both laboratories, and a comparison of TPH to petroleum-related analyte totals (e.g., total SVOCs, total PAHs+alkyl PAHs), the TestAmerica-South Burlington data were determined to be more representative of the total extractable TPH and were selectively reported when available. The remaining reportable TestAmerica-Edison data, although not less accurate based on the validated QC elements, may under-represent the true concentration of TPH-extractables in the wettest sediment samples.

4.2.18 TPH-purgeables

All data points generated for TPH-purgeables are considered valid and acceptable for assessment purposes; there were no rejected data points for this analyte group. **Figure 4-30** shows the summary of reasons for validation qualifiers applied to TPH-purgeables results. Low percent solids were the only basis for qualification and resulted in estimation (J/UJ) of detect and ND results for the affected samples.

4.2.19 VOCs

Ninety-seven percent of the data generated for VOCs are considered valid and acceptable for assessment purposes. A summary of reasons for validation qualifiers applied to VOCs is presented in **Figure 4-31**. As with most analytical fractions, low percent solids was the most frequent reason for the application of data qualifiers; detect and ND results for the affected samples were qualified as estimated (J/UJ). Other reasons for qualification are shown in **Figure 4-31**. Three percent of the data was rejected due to internal standard area counts that exceeded limits, calibration, holding time exceedance, or MS recovery. The rejected data are summarized in Section 4.3.

4.3 Rejected data

Of the 368,946 individual data points generated during the LPR LRC site characterization, 99.75 percent are valid and acceptable for assessment purposes, and 0.25 percent of the individual data points were rejected (933 individual data points out of the 368,946 reportable sediment results). The analyte groups with the largest numbers of rejected data were CN, metals, VOCs, herbicides and pesticides (Method 8081A and HRMS method). **Appendix N** lists all 933 sample data points that were rejected during validation as unusable. Discussion of the 953 specific reasons (several rejected data points had multiple reason codes applied) for data rejections are provided below:

- **Field duplicate.** The 6 rejected results were for low-level mercury, metals by Method 6010B, and metals by Method 6020, which had ≥ 120 percent RPDs in all cases.
- **Laboratory duplicate.** The 14 rejected results were for metals analysis where the RPD between both values was greater than 120 percent.
- **Dual column RPD.** Twenty-five results were rejected for herbicides due to dual column RPD exceedance of greater than 90 percent, as specified in the USEPA Region 2 validation guidance.
- **LCS recovery.** Two results for pesticides by GC/ECD were rejected due to LCS recovery below the laboratory's lower control limit, as required by Region 2 validation guidance.
- **MS recovery.** A total of 202 results were rejected due to low MS recovery, including analyses for CN, pesticides by GC/ECD, metals, herbicides, SVOCs, butyltins, VOCs, mercury (Method 1631E), PCB Aroclors, Cr(VI), pesticides by HRGC/HRMS, and TKN.
- **Surrogate recovery.** Thirty-five results for pesticides by GC/ECD were rejected due to low (less than 10 percent) surrogate recoveries.
- **Labeled compound recovery.** Thirty-three results for PCB congeners and pesticides by HRGC/HRMS were rejected due to the labeled compound recovery nonconformances being less than 10 percent.
- **Equipment blank contamination.** Four metals results (Method 6020) were rejected due to high equipment blank contamination (results were greater than the RL, but less than the concentration in the equipment blank).
- **Missing blank information.** Two ND results for PAHs by HRGC/LRMS-SIM were rejected due to missing method blank information.
- **Calibration.** Rejected results included 159 VOCs and 12 metals by Method 6010B. The rejected VOC results included four target analyte ketones that had factors below the acceptance criteria of 0.05. It is difficult for laboratories to meet this minimum response factor (which is a validation requirement, but not a method requirement), particularly for poorly purging target analytes. For metals, results in one sample batch were rejected for potassium due to non-attainment of the check standard minimum recovery (50 percent).
- **Internal standards.** Rejected results included 246 NDs for VOCs (where the area count was less than 25 percent of the area in the associated calibration standard).
- **Holding times.** There were 206 results rejected due to holding time exceedances for pesticides by GC/ECD, VOCs, SVOCs, butyltins, and TPH-extractables.
- **Low percent solids.** There were two metals results (Method 6010B) rejected due to low percent solids.
- **ICS results.** Five metals results (Method 6020) were rejected based on interference check sample results.

Of the 368,946 individual data points generated during the LRC site characterization, 368,013 (or 99.75 percent) are valid and usable. Data limitations identified during the validation process were identified using data qualifiers applied by the validator. Issues identified during validation have been summarized here. Specific details regarding selected analytes or locations are provided in the individual DVRs provided by reference or as updated DVRs in **Appendix N**.

Table 4-1 Data Qualification and Rejection Based on Accuracy Indicators

Accuracy Indicator	Data Qualified ^{1, 2}		Data Rejected ¹		Comments
	Affected Analyses	Percent	Affected Analyses	Percent	
LCS recovery	<i>Butyltins, PCDDs/PCDFs, herbicides, PAHs by HRGC/LRMS-SIM, PCB congeners, pesticides by HRGC/HRMS, pesticides by GC/ECD, TPH-extractables, SVOCs, and VOCs</i>	0.36	Pesticides by GC/ECD	0.0005	Validation guidance that is unique to pesticides requires rejection of data whenever an associated LCS result falls below established control limits.
MS Recovery	<i>Butyltins, CN, PCDDs/PCDFs, herbicides, mercury, methyl mercury, metals by 6010 and 6020, Cr(VI), phosphorus, PCB Aroclors, PCB congeners, PAHs by HRGC/LRMS-SIM, pesticides by GC/ECD, pesticides by HRGC/HRMS, sulfide, TKN, TPH-extractables, SVOCs, and VOCs</i>	0.34	Butyltins, CN, herbicides, mercury, metals by 6010 and 6020, Cr(VI), TKN, PCB Aroclors, pesticides by GC/ECD, pesticides by HRGC/HRMS, SVOCs, and VOCs	0.05	MS recovery issues, unlike LCS recoveries, can be indicative of extraction difficulties or interferences from the sample matrix.
Surrogate recovery	<i>Butyltins, herbicides, PCB Aroclors, pesticides by GC/ECD, TPH-extractables, SVOCs, and VOCs</i>	2.5	Pesticides by GC/ECD	0.009	Surrogate recovery issues, unlike LCS recoveries, can be indicative of extraction difficulties or interferences from the sample matrix.

Table 4-1 Data Qualification and Rejection Based on Accuracy Indicators (Continued)

Accuracy Indicator	Data Qualified ^{1, 2}		Data Rejected ¹		Comments
	Affected Analyses	Percent	Affected Analyses	Percent	
Calibration	Butyltins, PCDDs/PCDFs, herbicides, metals by 6020, PAHs by HRGC/LRMS-SIM, PCB Aroclors, pesticides by GC/ECD, pesticides by HRGC/HRMS, SVOCs, TPH-extractables, and VOCs	0.79	Metals by 6010B and VOCs	0.05	<p>The complexity of the sample matrix had a significant impact on continuing calibration results for certain analyses and required laboratories to recalibrate with greater frequency.</p> <p>The rejected metals results (6010B) are 12 potassium results where the associated check sample failed to meet the minimum recovery of 50 percent.</p> <p>The rejected VOC results are due to four ketones that had relative response factors below the validation criteria of 0.05. Calibration factors for these poorly purging ketones, although acceptable per method criteria, are common causes for data rejection during validation.</p>
Internal standard	SVOCs and VOCs	0.17	VOCs	0.07	High or low area counts.
EMPCs	PCDDs/PCDFs, PAHs by HRGC/LRMS-SIM, PCB congeners, and pesticides by HRGC/HRMS			0	Qualified due to ion ratio, signal noise ratio, or peak retention issue.
Quantitation	PCDDs/PCDFs, Cr(VI), PAHs by HRGC/LRMS-SIM, PCB Aroclors, PCB congeners, pesticides by GC/ECD, and pesticides by HRGC/HRMS	1.2		0	

Table 4-1 Data Qualification and Rejection Based on Accuracy Indicators (Continued)

Accuracy Indicator	Data Qualified ^{1, 2}		Data Rejected ¹		Comments
	Affected Analyses	Percent	Affected Analyses	Percent	
Holding time	Butyltins, CN, herbicides, TKN, PAHs by HRGC/LRMS-SIM, pesticides by GC/ECD, pesticides by HRGC/HRMS, gamma isotopes, sulfide by 9030, SVOCs, VOCs, TOC, and TPH-extractables	0.48	Butyltins, pesticides by GC/ECD, pesticides by HRGC/HRMS, SVOCs, VOCs, and TPH-extractables	0.06	Holding time deviations resulted in some cases from the need to reanalyze samples. Validation rules for some analyte groups required rejection of data generated beyond holding times, while in other cases data needed only to be flagged as estimated.
Temperature preservation	Butyltins, CN, mercury, Cr(VI), PAHs by HRGC/LRMS-SIM, PCB Congeners, pesticides by GC/ECD, sulfide by 9030, SVOCs, VOCs, and TOC	1.4		0	Temperature excursions generally were minor and were the result of delays during shipment.
Ether interference	PCDD/PCDFs	0.03		0	
Chromatographic pattern match	PCB Aroclors	0.45		0	
Chromatographic resolution	Pesticides by HRGC/HRMS and SVOCs	0.06		0	
Sample result uncertainty	Radiochemistry (alpha and gamma)	0.096		0	
Compound identification	Butyltins and VOCs	0.001		0	

Table 4-1 Data Qualification and Rejection Based on Accuracy Indicators (Continued)

Accuracy Indicator	Data Qualified ^{1, 2}		Data Rejected ¹		Comments
	Affected Analyses	Percent	Affected Analyses	Percent	
Serial dilution	Metals by 6010 and 6020	0.16		0	Serial dilution results that differ by more than 10 percent can indicate that an interference to a particular element is present and is being reduced through the dilution.
ICS results	Metals by 6010 and 6020	0.06	Metals by 6020	0.0014	The potential may exist for interference from other sample constituents.
Post-extraction spike	PAHs by HRGC/LRMS-SIM	0.047		0	
Reporting limit	Pesticides by GC/ECD and VOCs	1.39		0	Raised due to chromatographic interferences.
Evidence of ion suppression	PCB congeners	0.035		0	
Clean up standard recovery	PCDD/PCDFs and PCB congeners	0.22		0	
Labeled compound recovery	PCDD/PCDFs, PAHs by HRGC/LRMS-SIM, PCB congeners, and pesticides by HRGC/HRMS	0.78	PCB congeners and pesticides by HRGC/HRMS	0.0090	

Notes:

¹ Based on total number of reportable sediment results. For percentages by analyses, refer to **Figures 4-1** through **4-32**.² Includes the application of all qualifiers in **Table 2-12**, with the exception of "R" (rejected).

Figure 4-1 AVS Qualification Summary

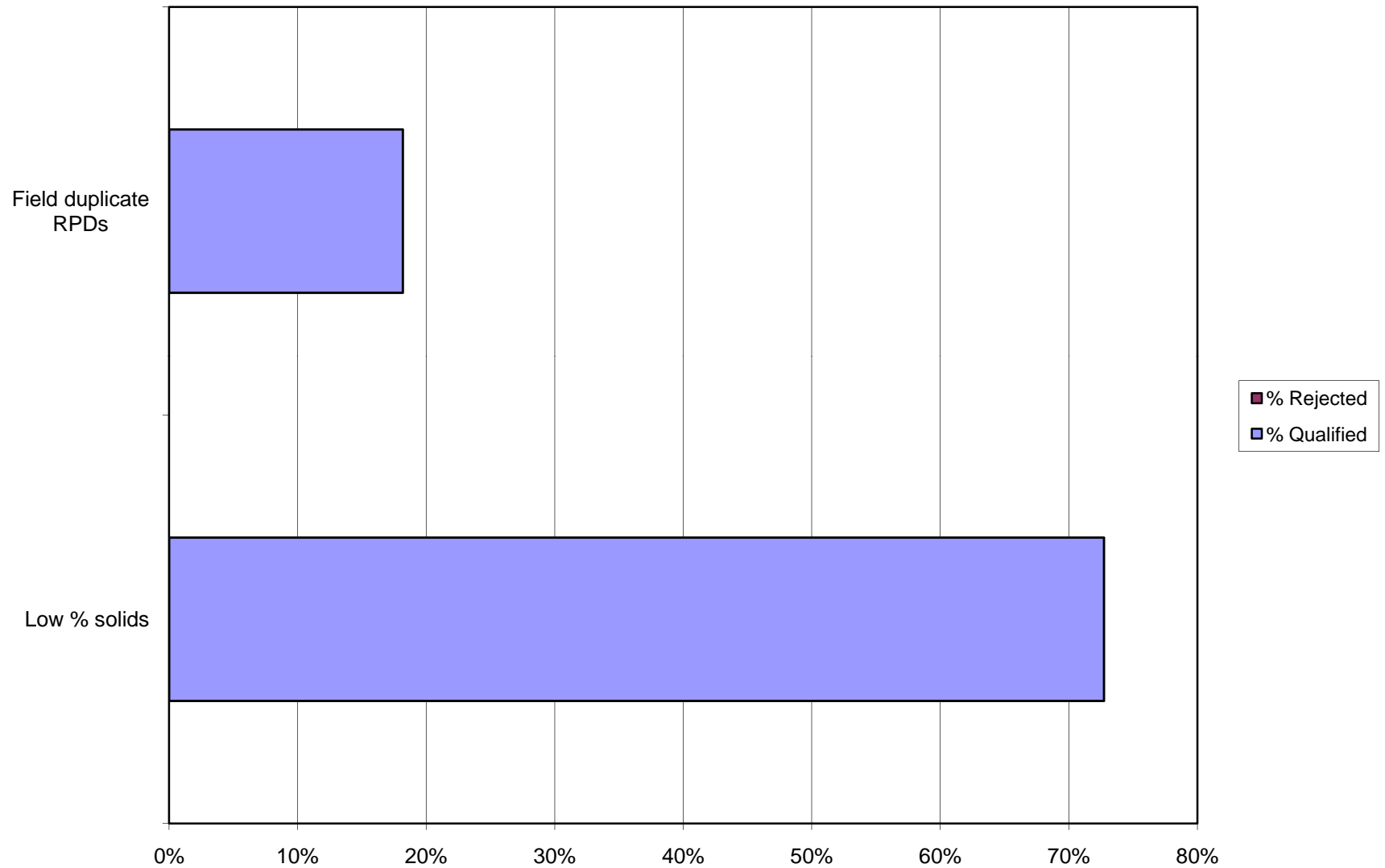


Figure 4-2 Metals SEM Qualification Summary

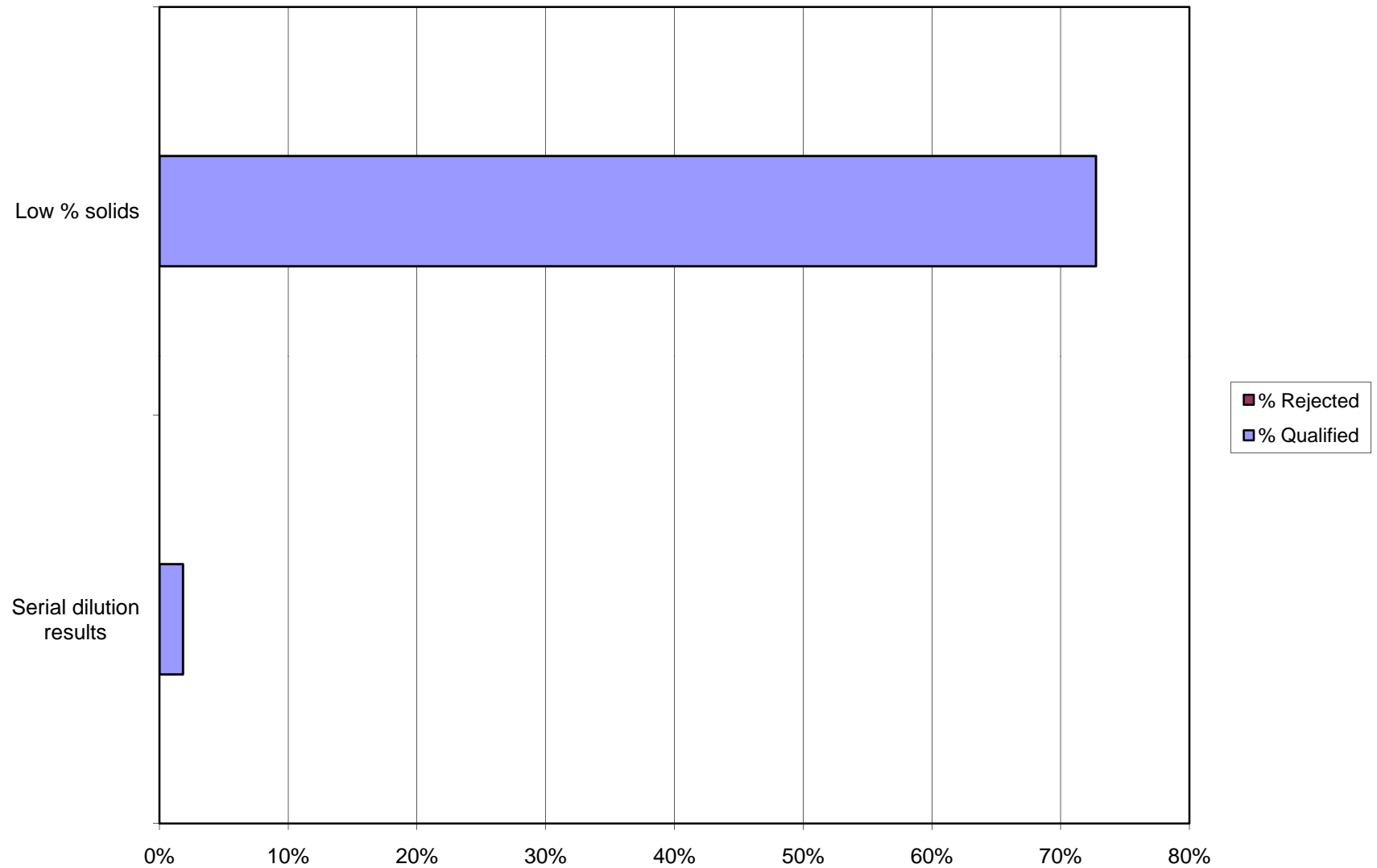


Figure 4-3 Mercury SEM Qualification Summary

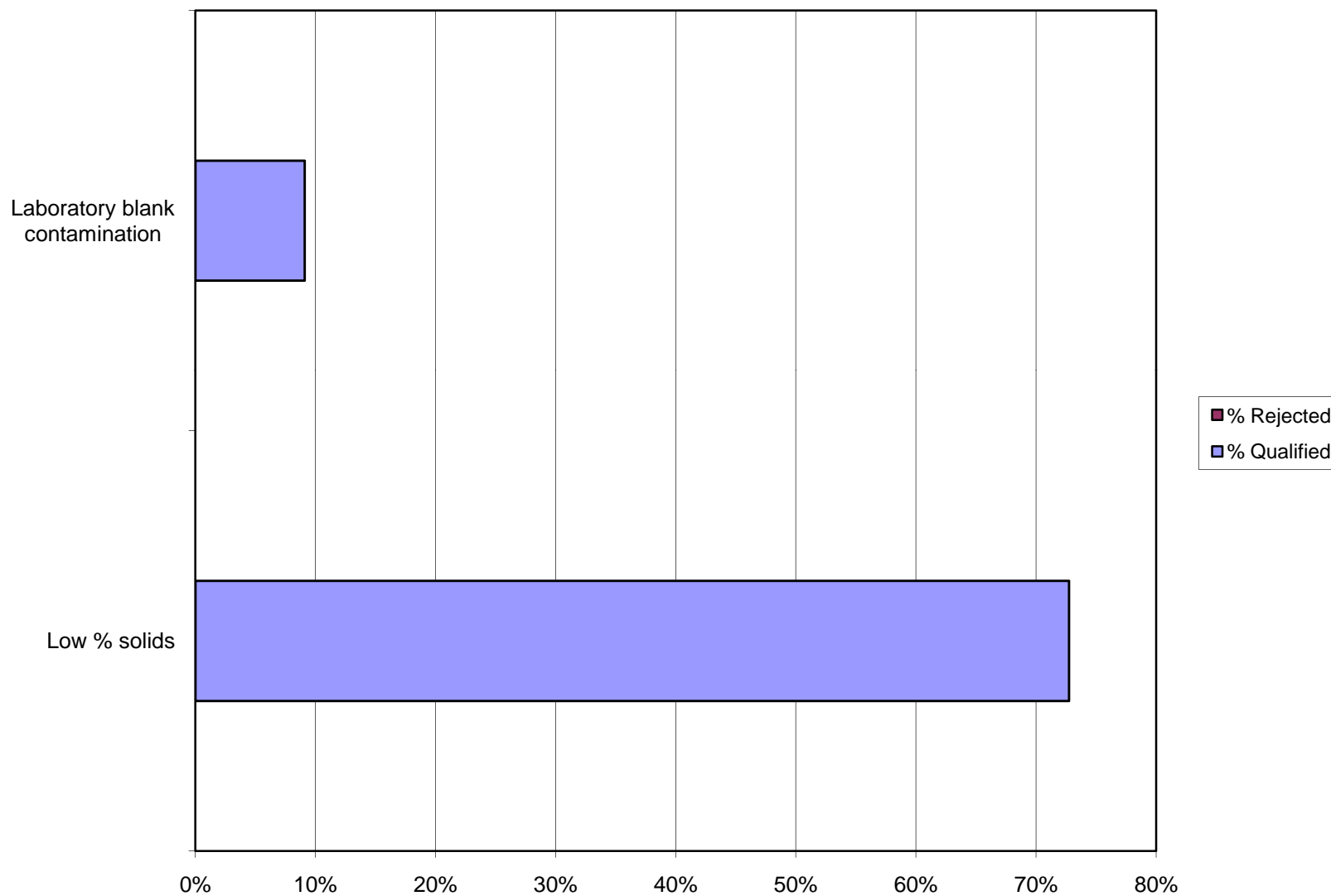


Figure 4-4 Butyltin Qualification Summary

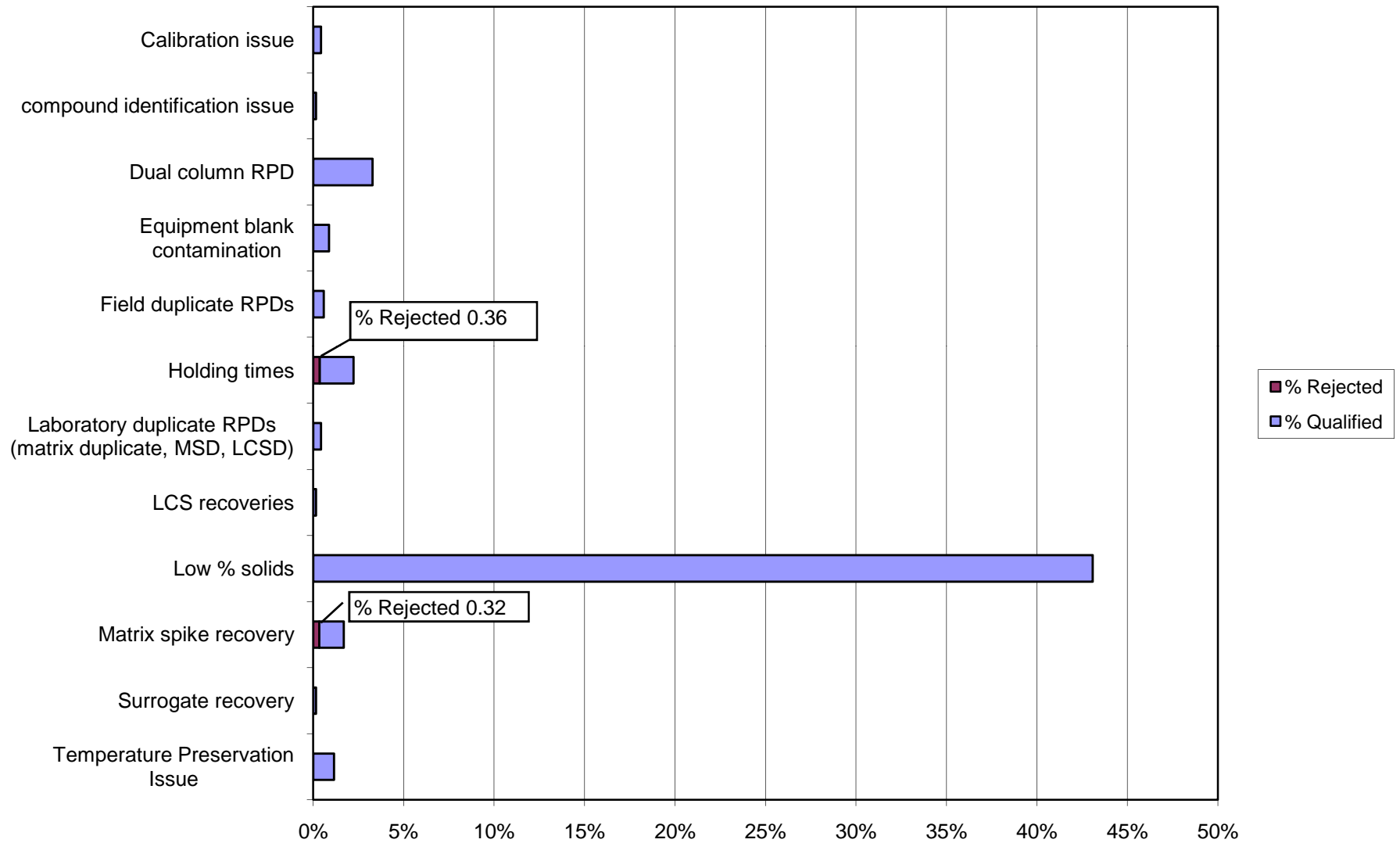


Figure 4-5 PCDDs/PCDFs Qualification Summary

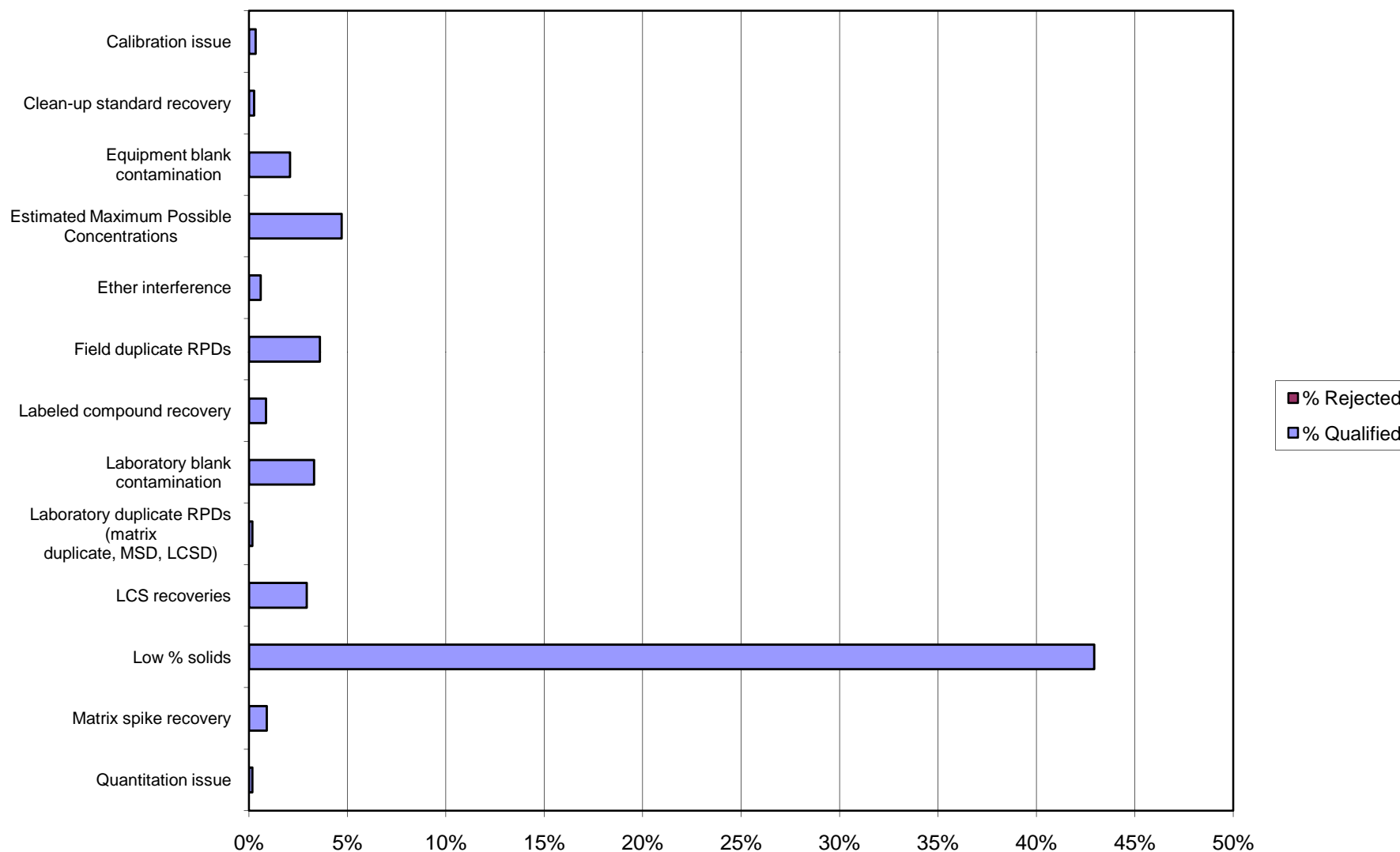


Figure 4-6 Ammonia Qualification Summary

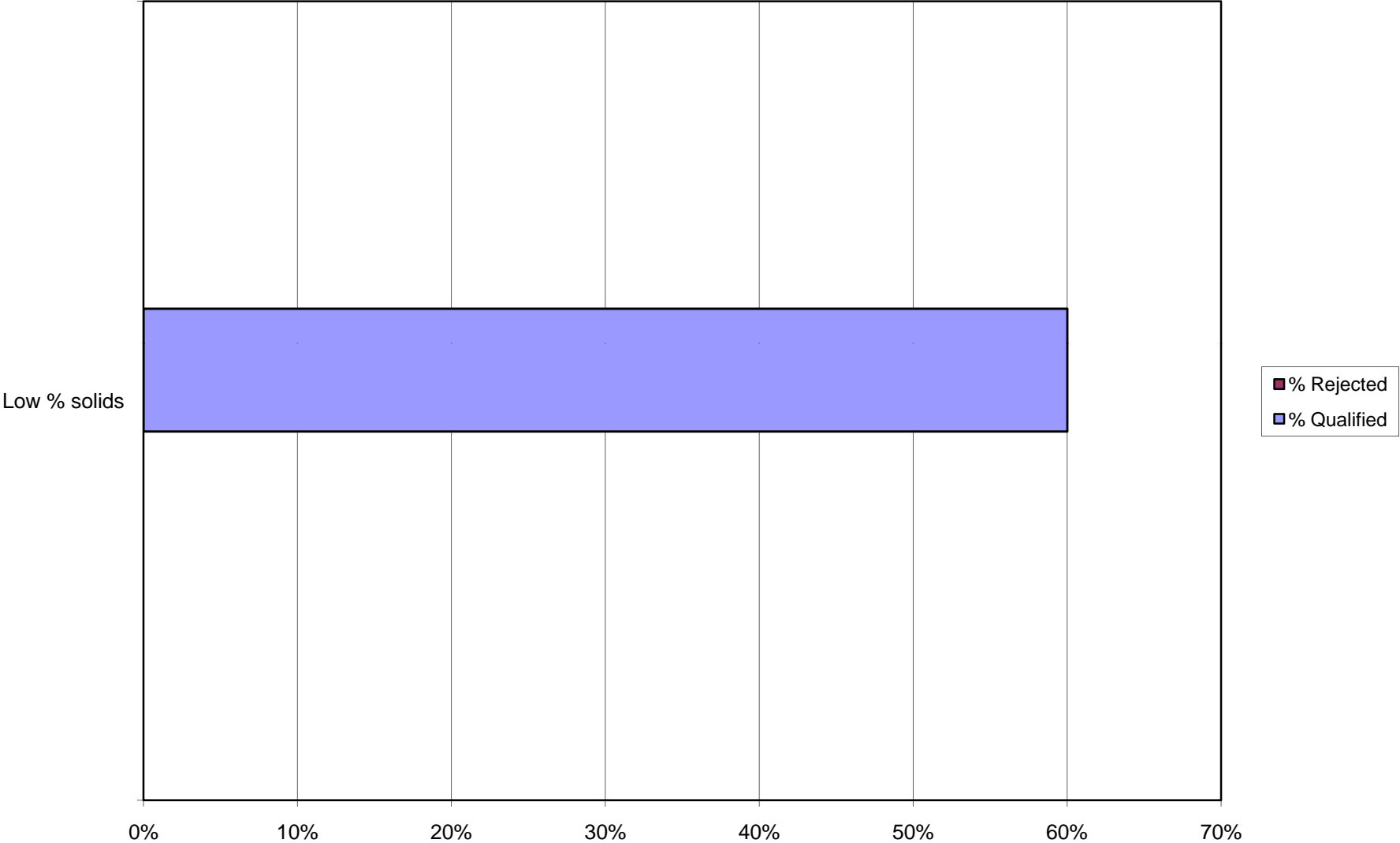


Figure 4-7 Cyanide Qualification Summary

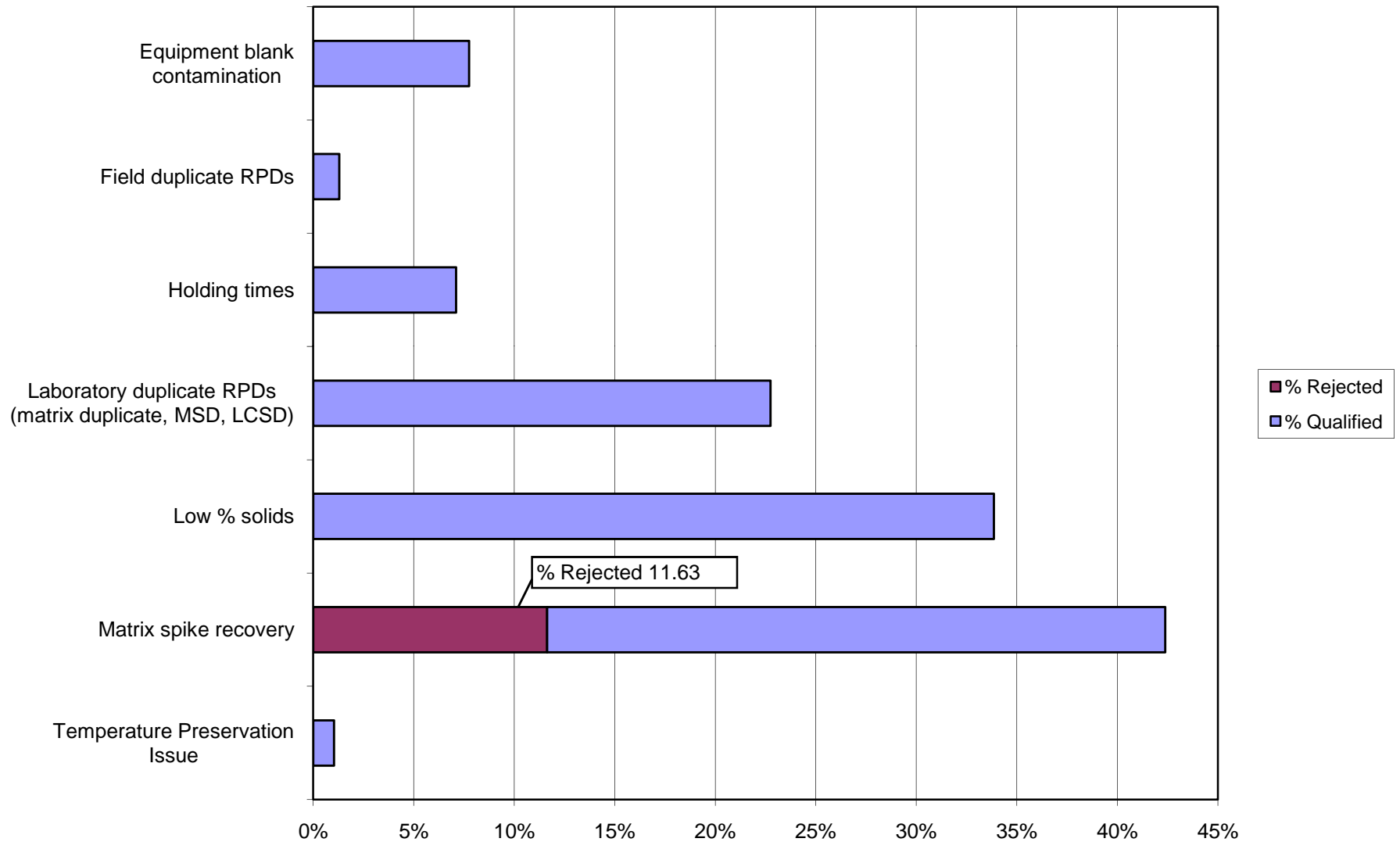


Figure 4-8 Phosphorus Qualification Summary

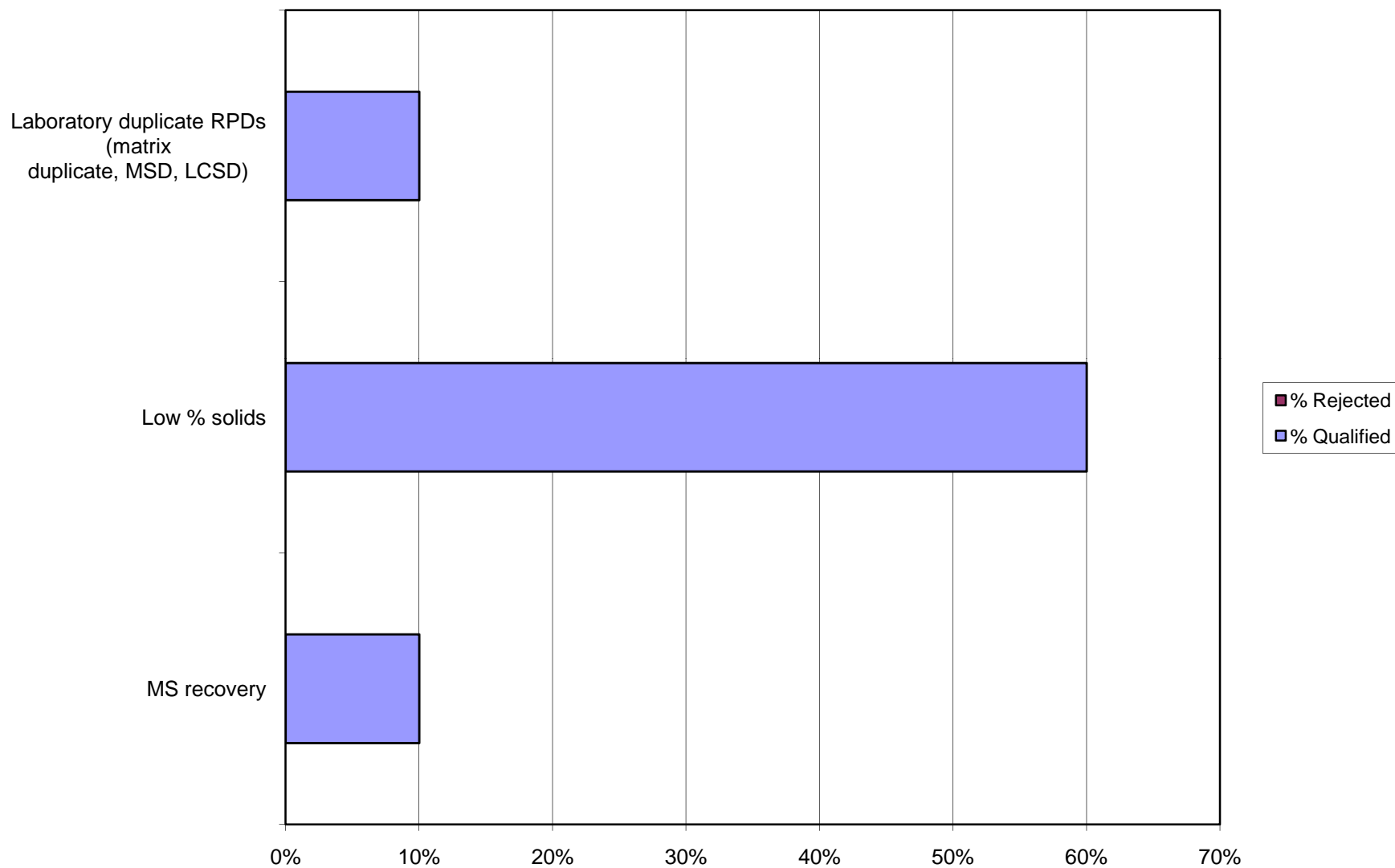


Figure 4-9 Sulfide Qualification Summary

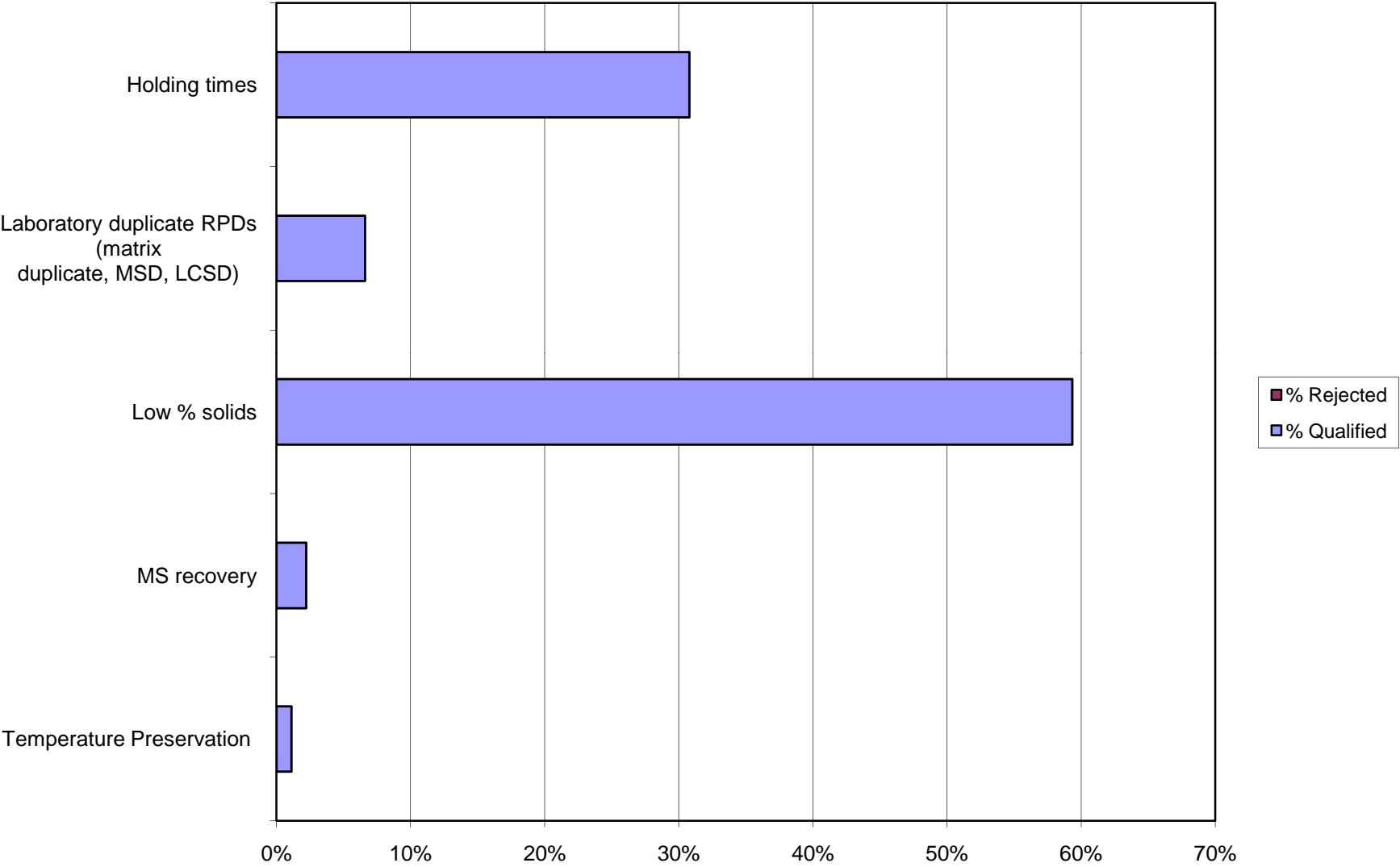


Figure 4-10 TKN Qualification Summary

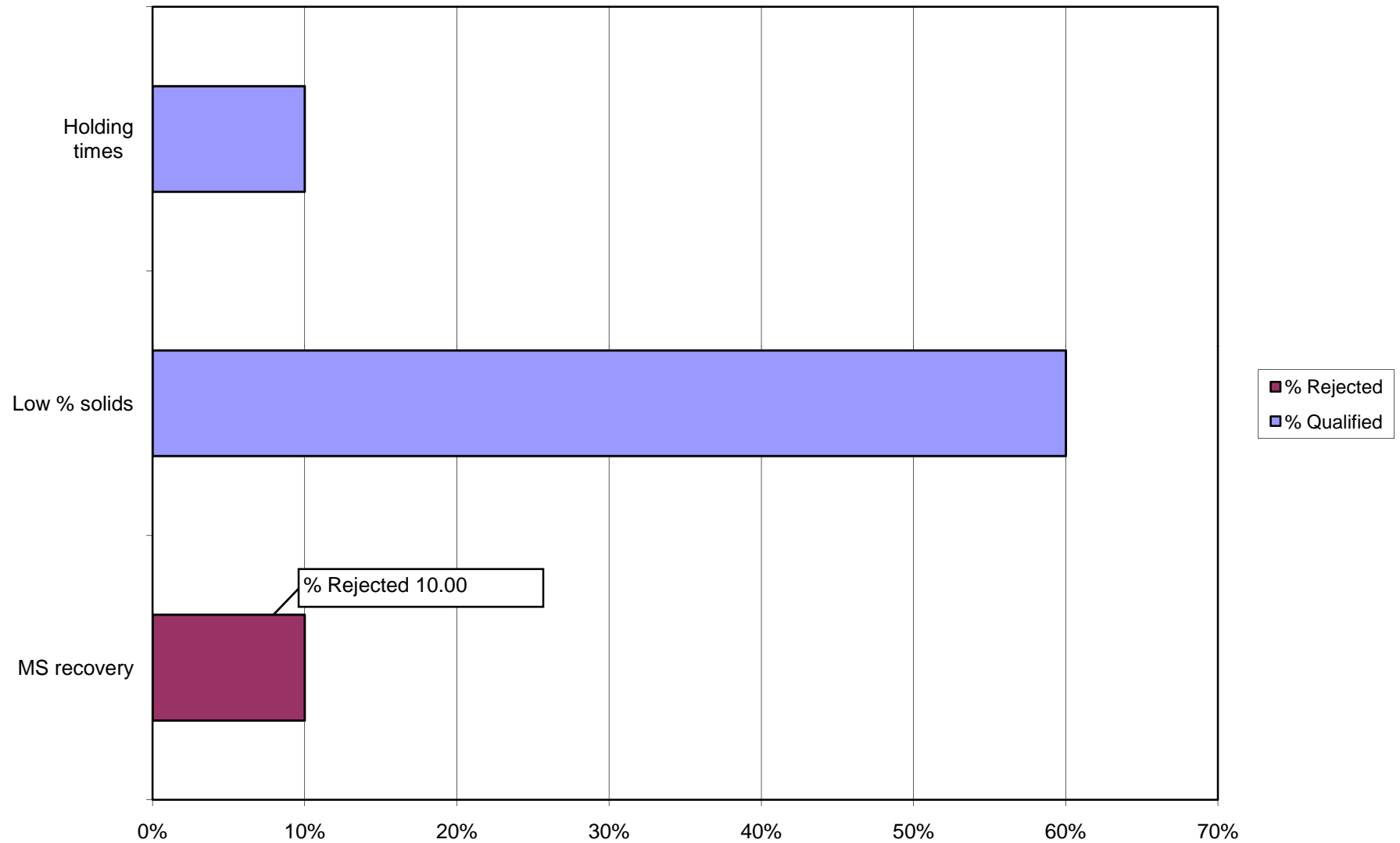


Figure 4-11 TOC Qualification Summary

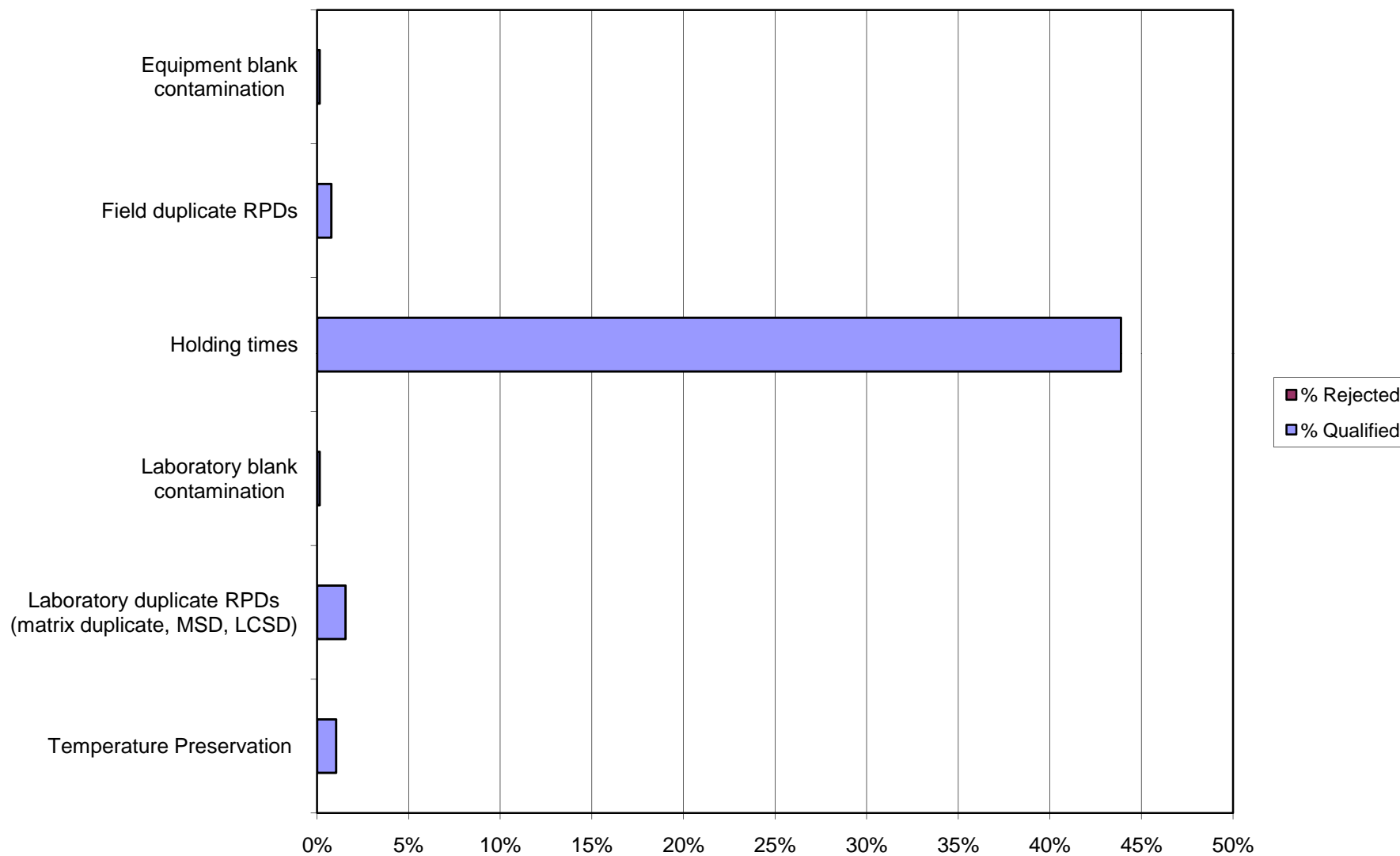


Figure 4-12 Grain Size Qualification Summary

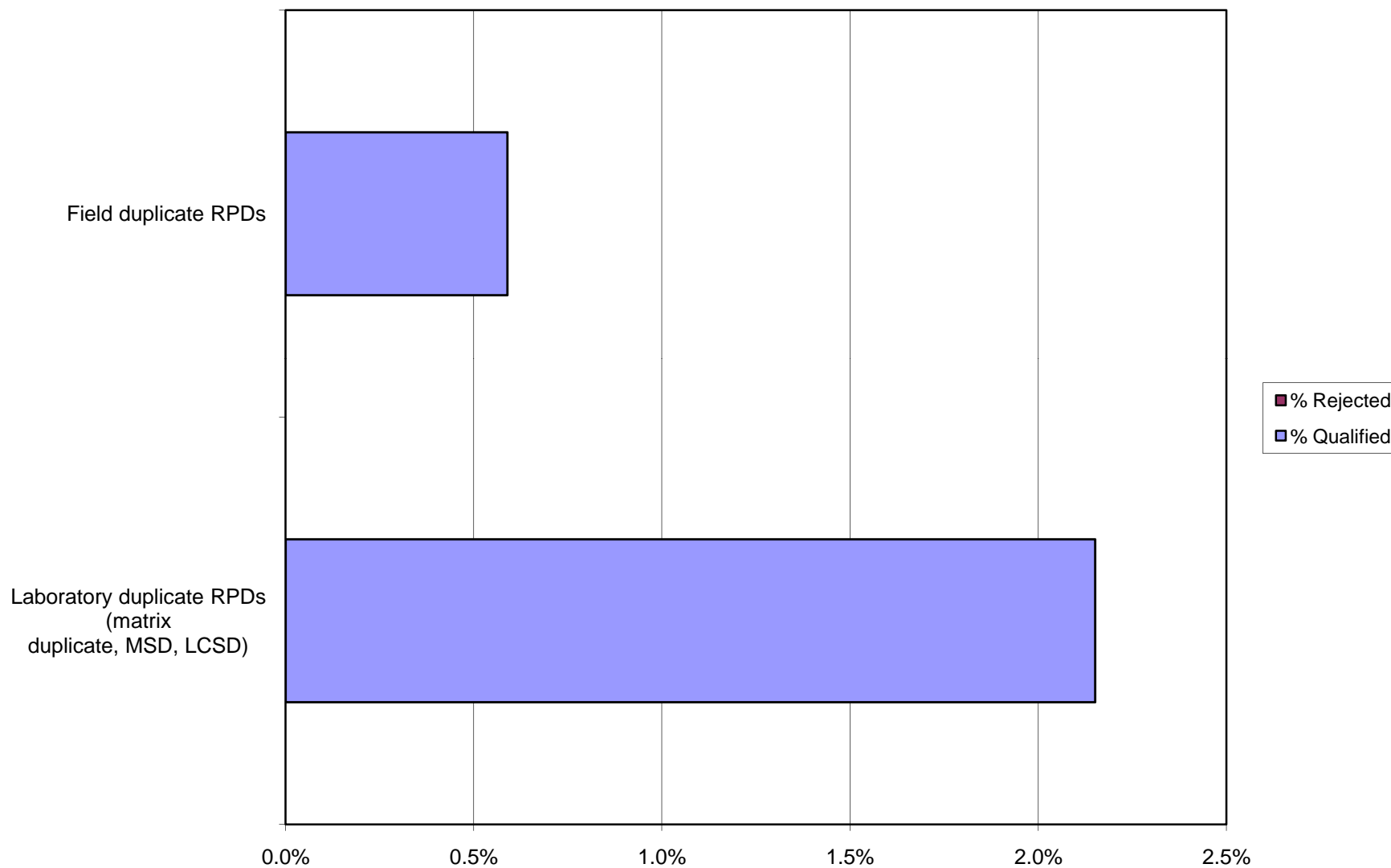


Figure 4-13 Herbicide Qualification Summary

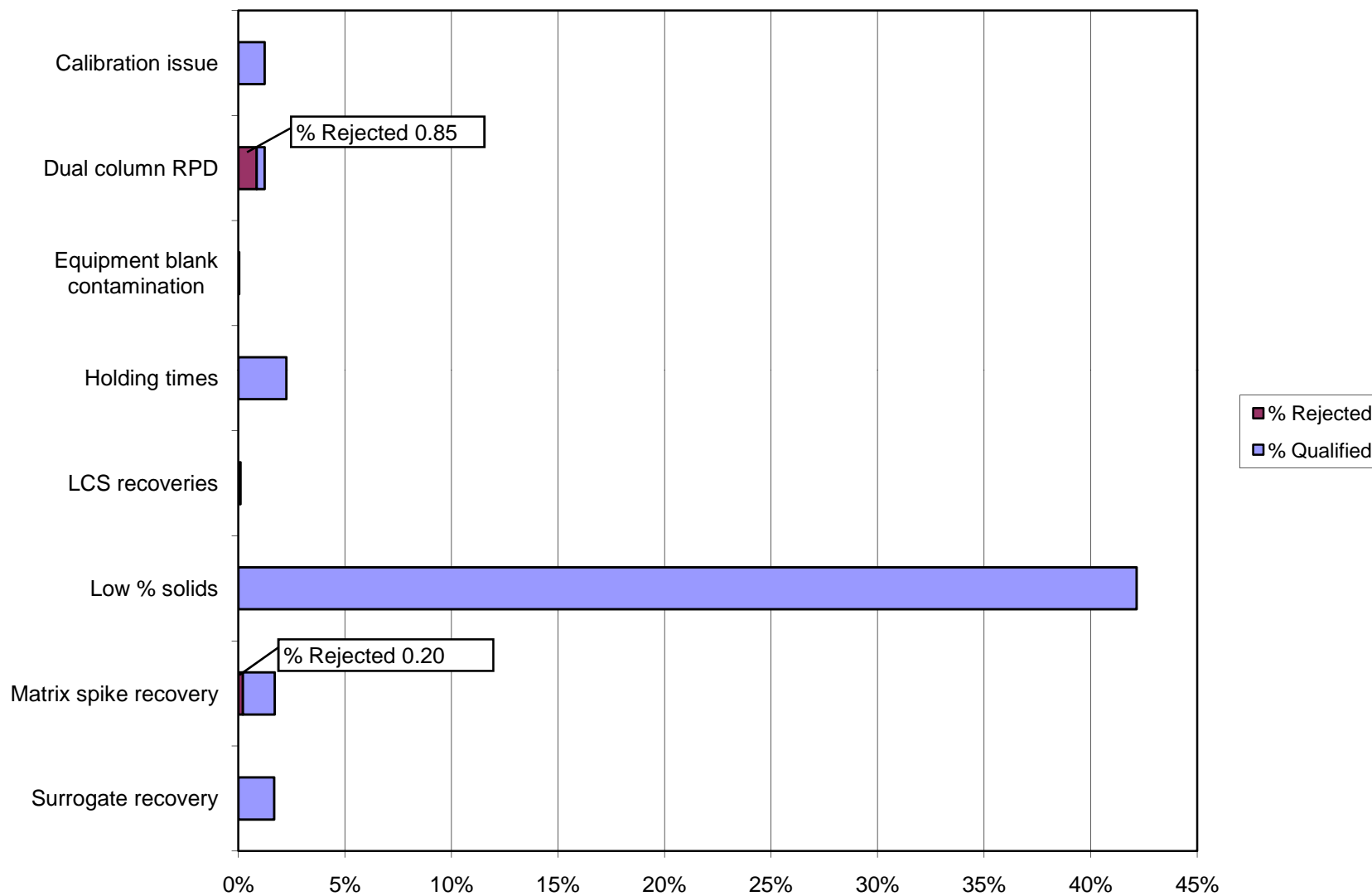


Figure 4-14 Hexavalent Chromium Qualification Summary

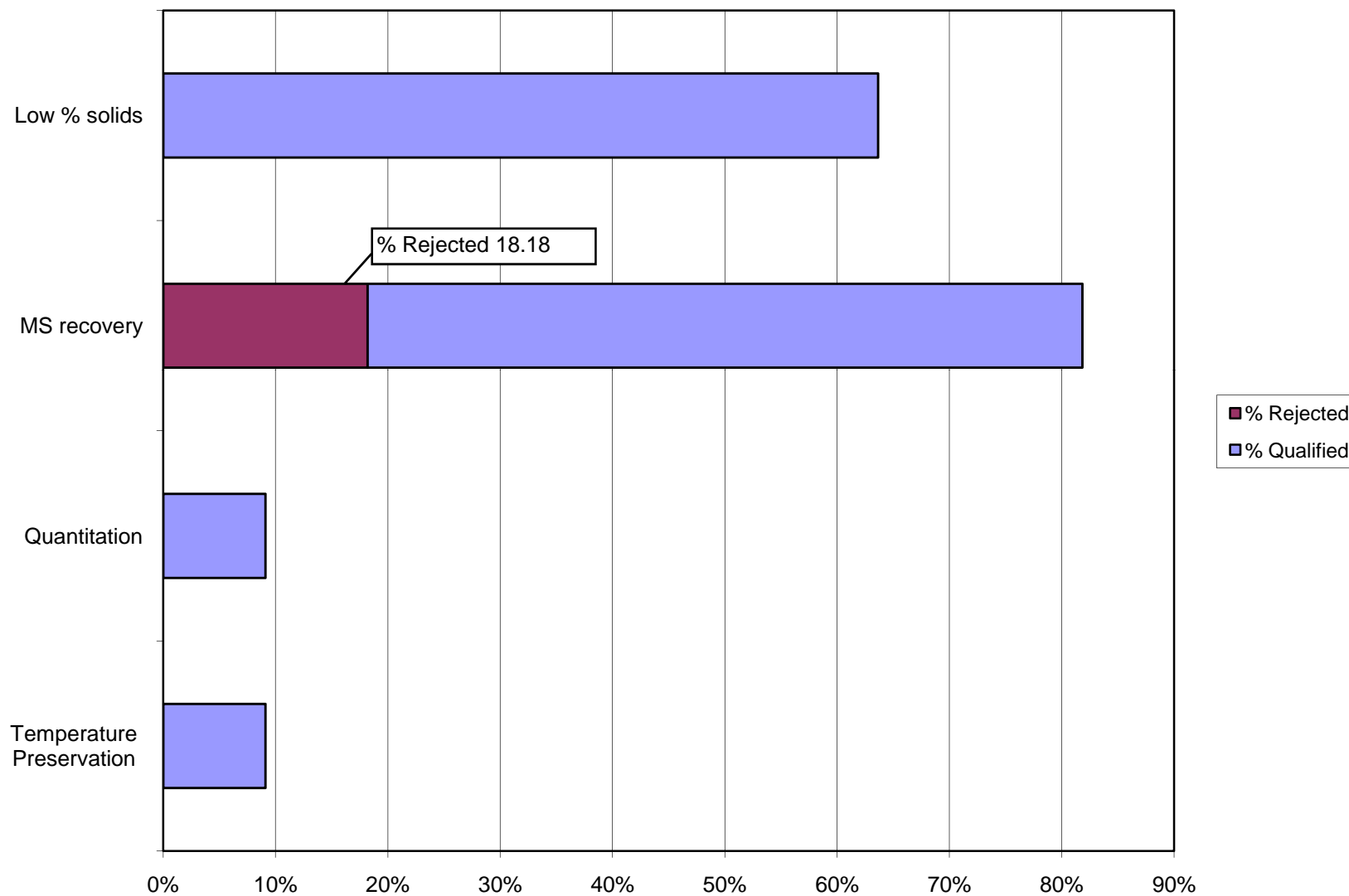


Figure 4-15 Mercury Method 1631E Qualification Summary

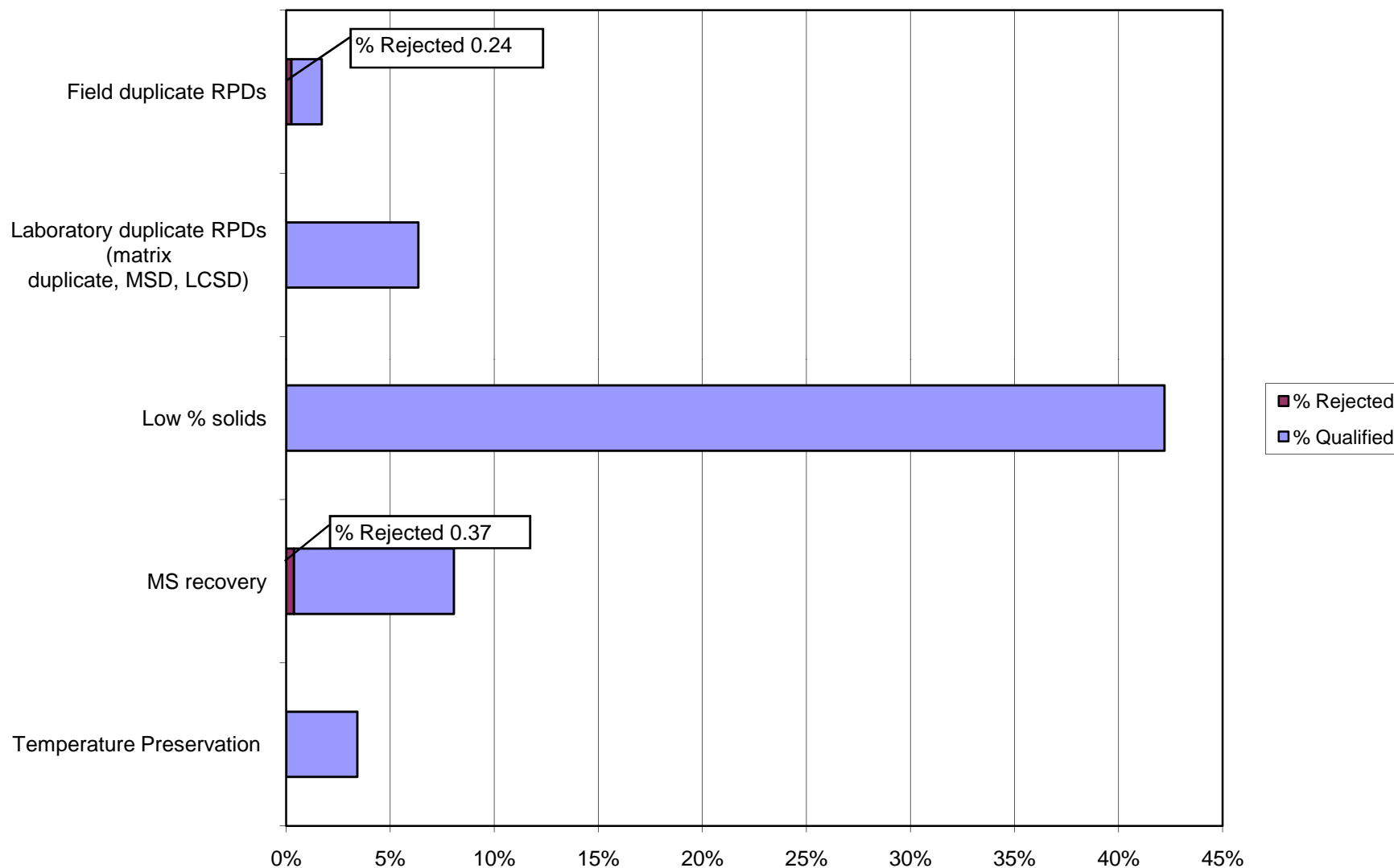


Figure 4-16 Methyl Mercury Qualification Summary

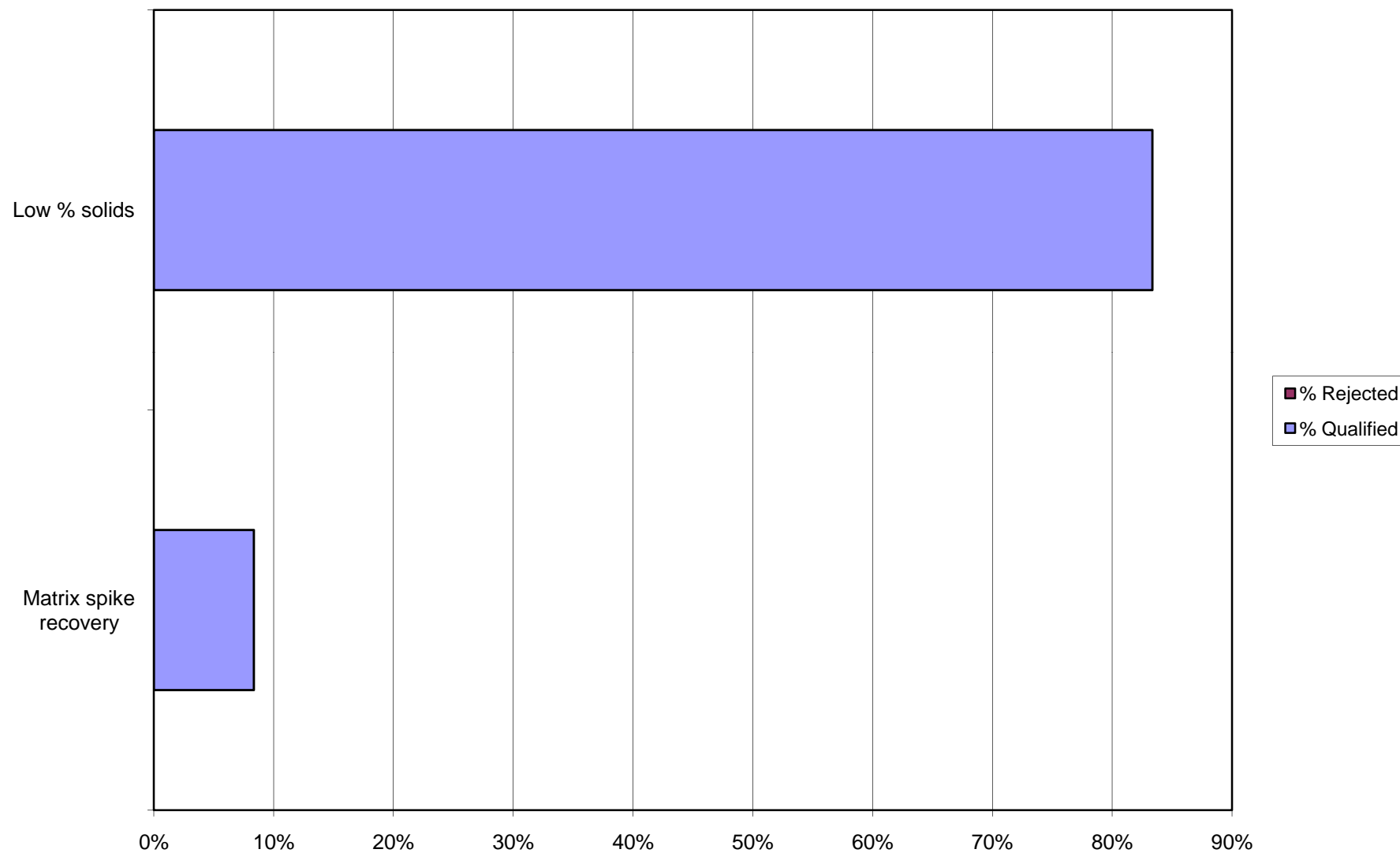


Figure 4-17 Metals Method 6010B Qualification Summary

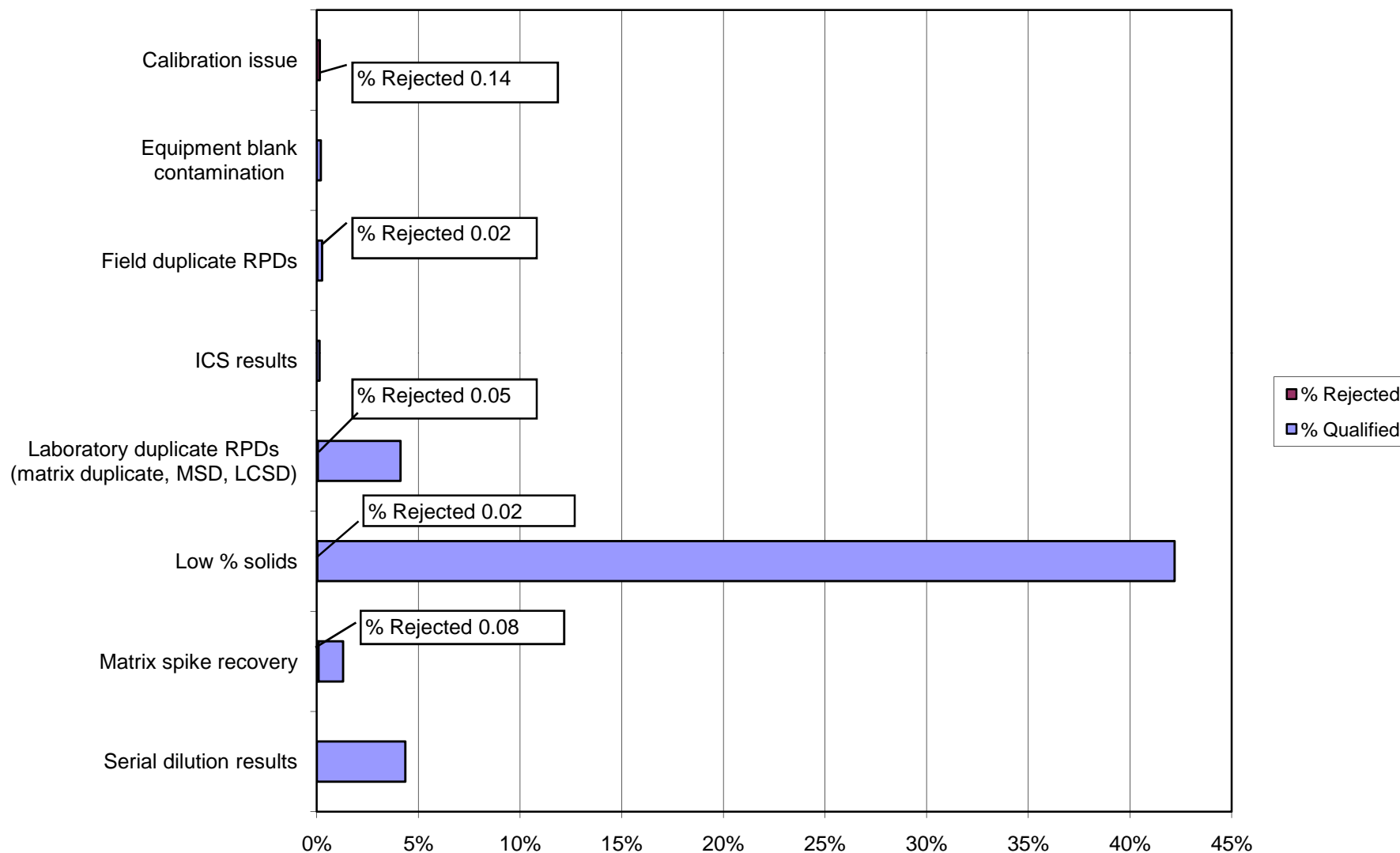


Figure 4-18 Metals Method 6020 Qualification Summary

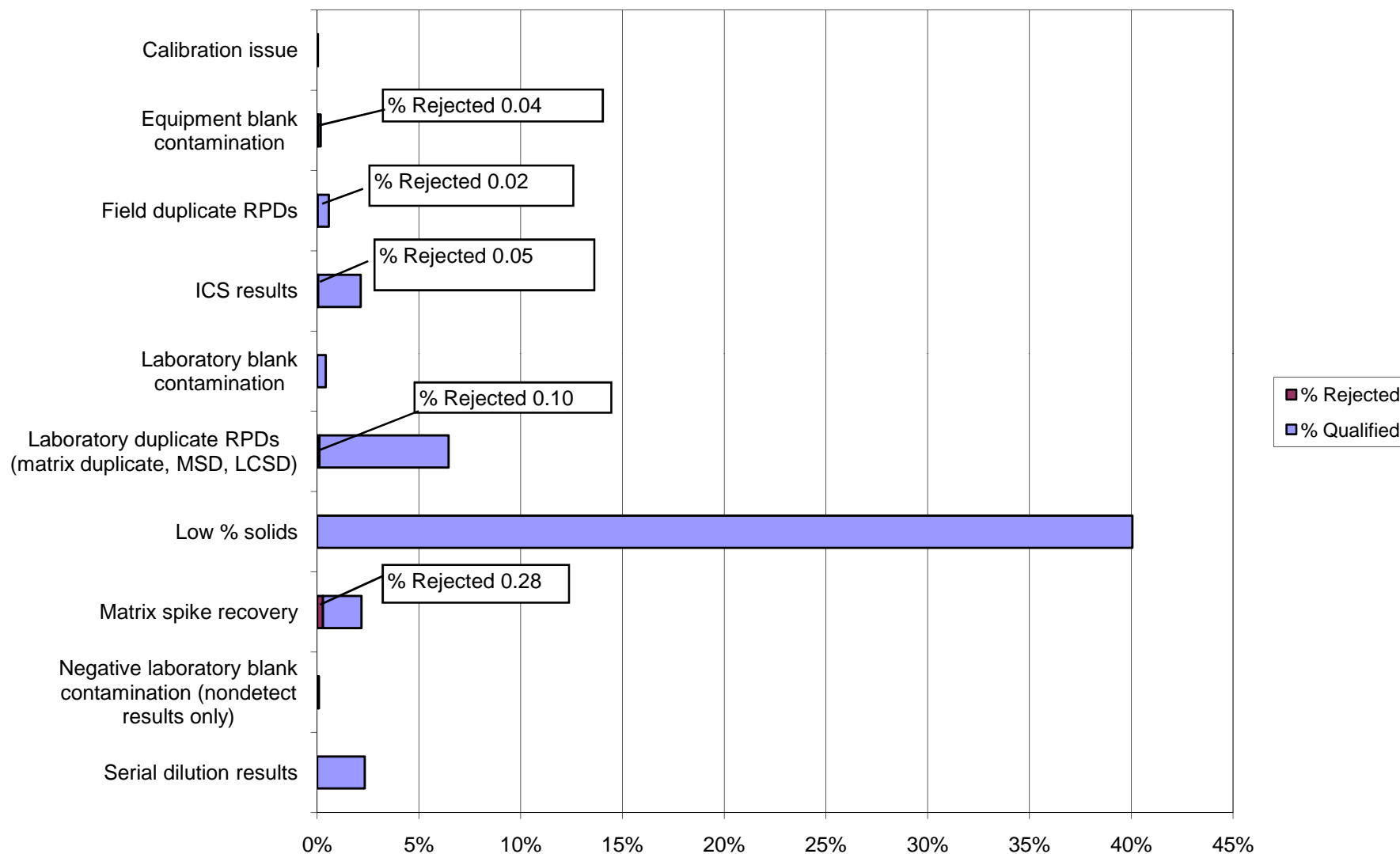


Figure 4-19 Selenium Method 7740 Qualification Summary

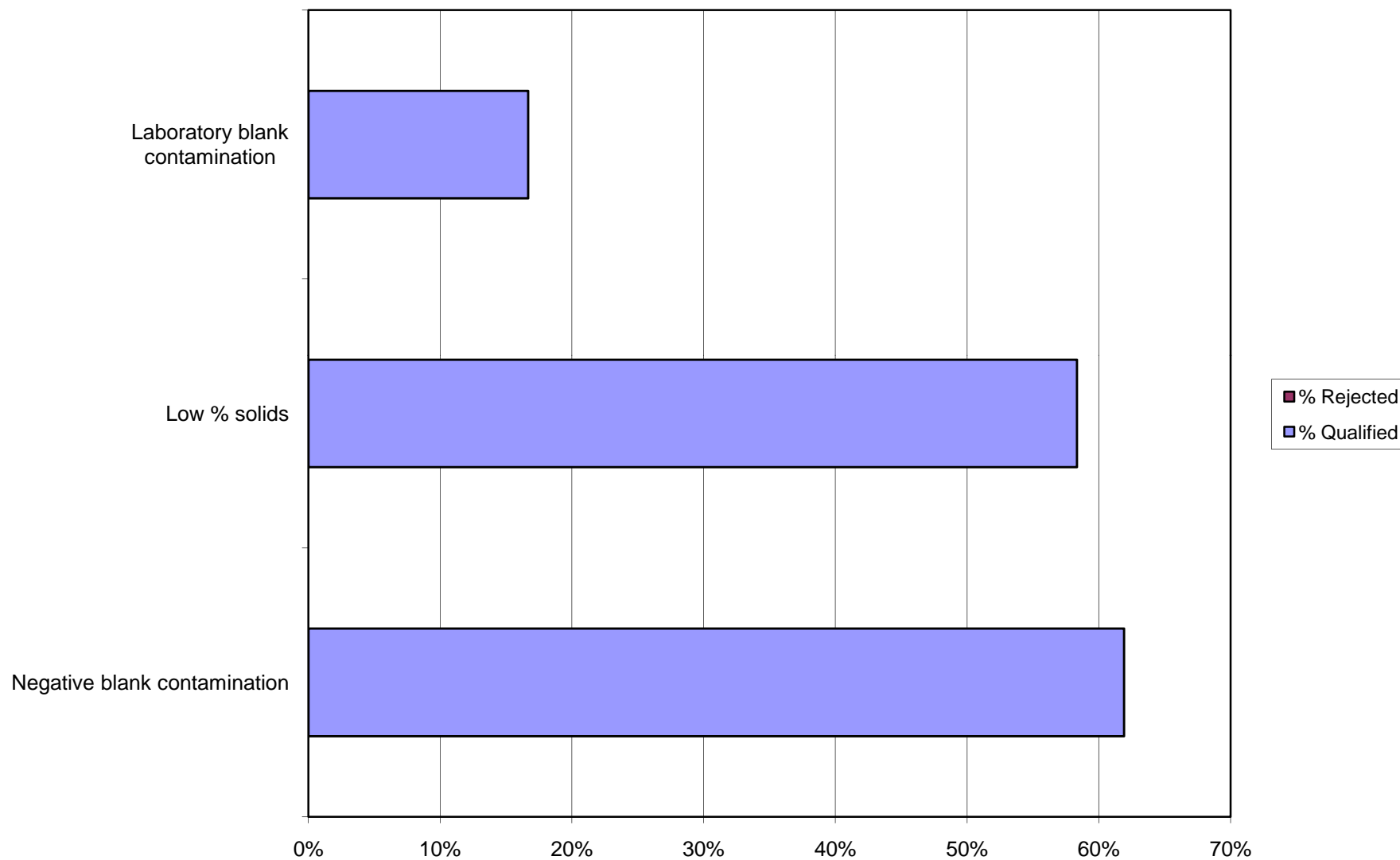


Figure 4-20 PAHs by HRGC/LRMS-SIM Qualification Summary

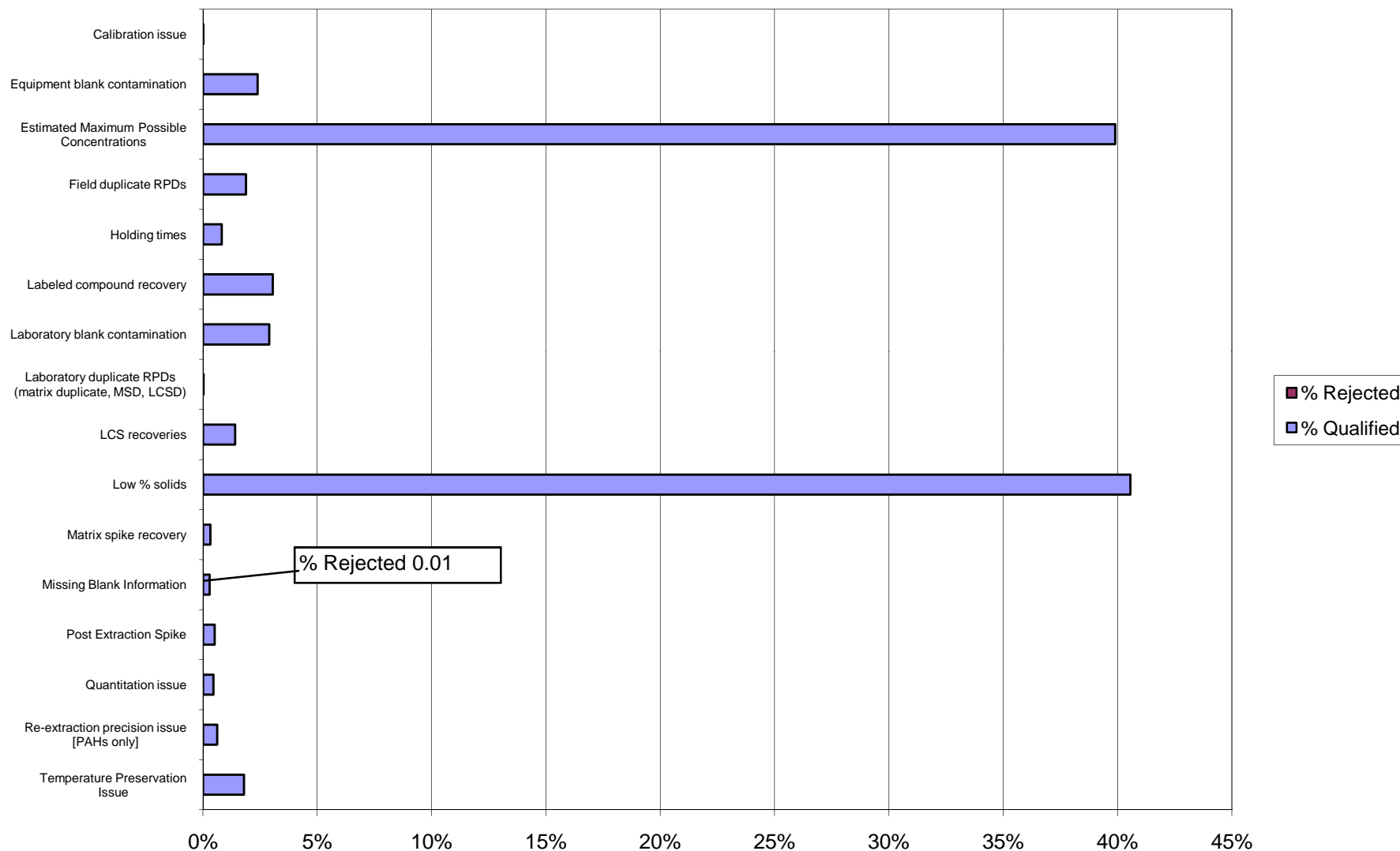


Figure 4-21 PCB Aroclors Qualification Summary

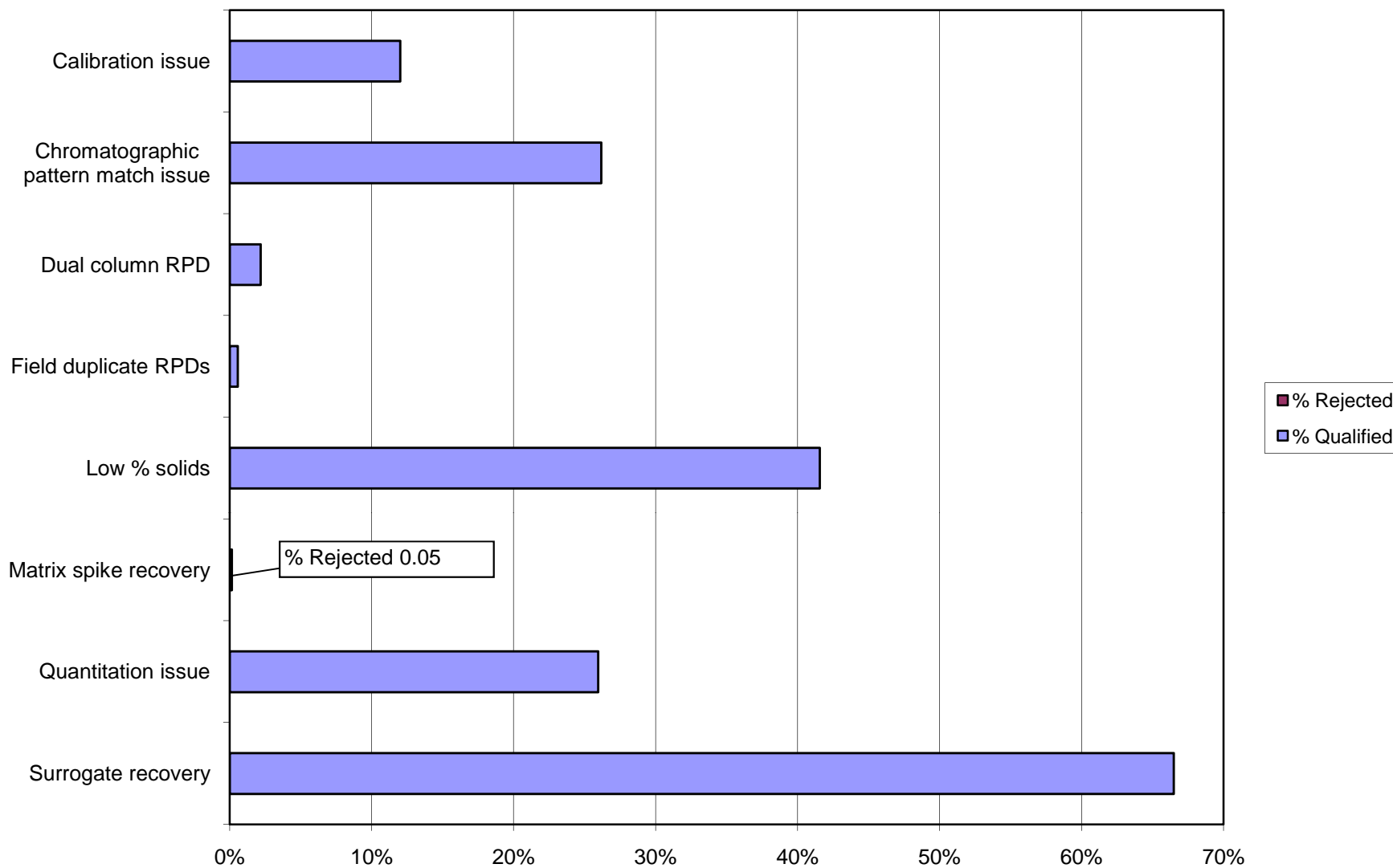


Figure 4-22 PCB Congeners Qualification Summary

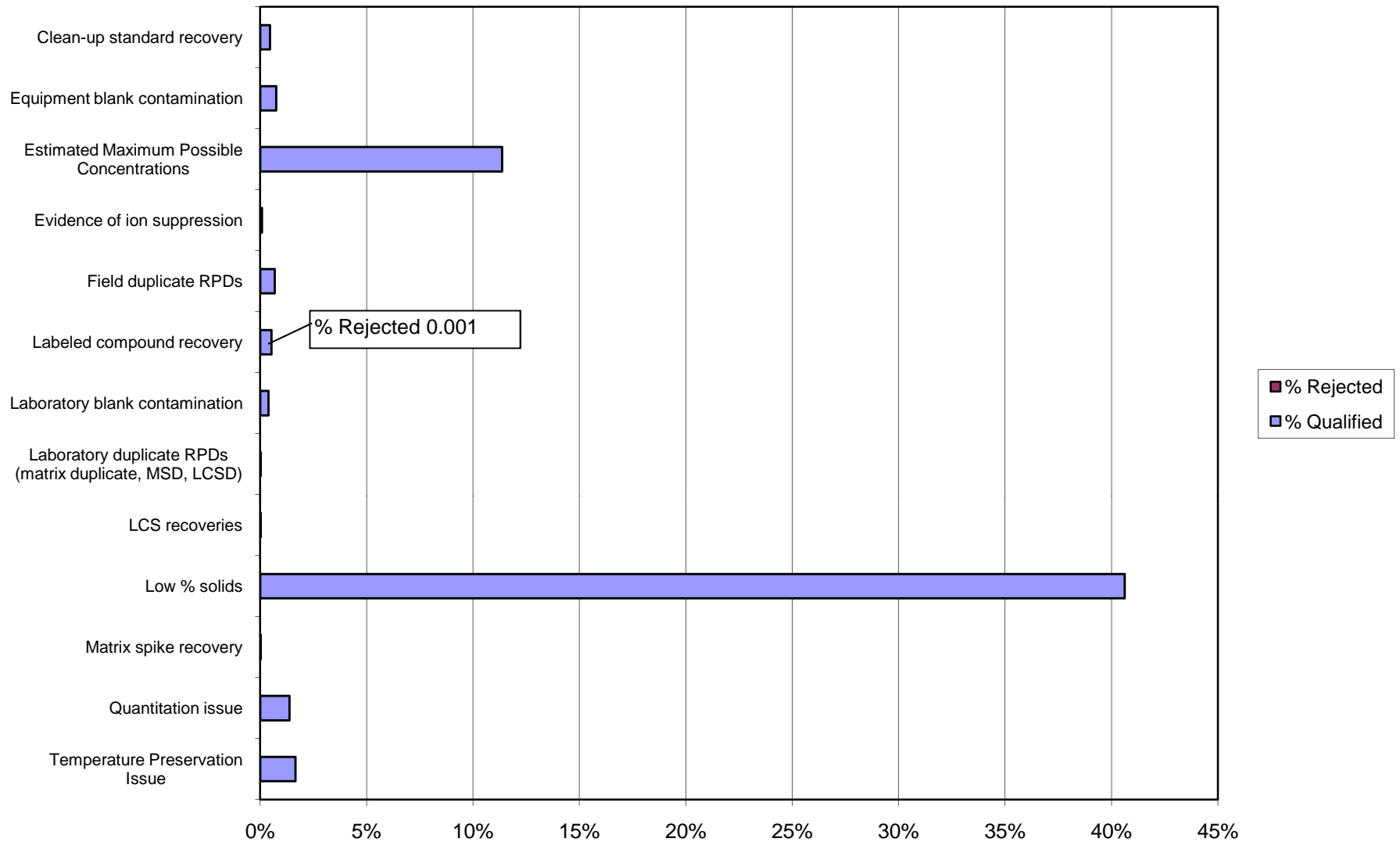


Figure 4-23 Pesticides by GC/ECD Qualification Summary

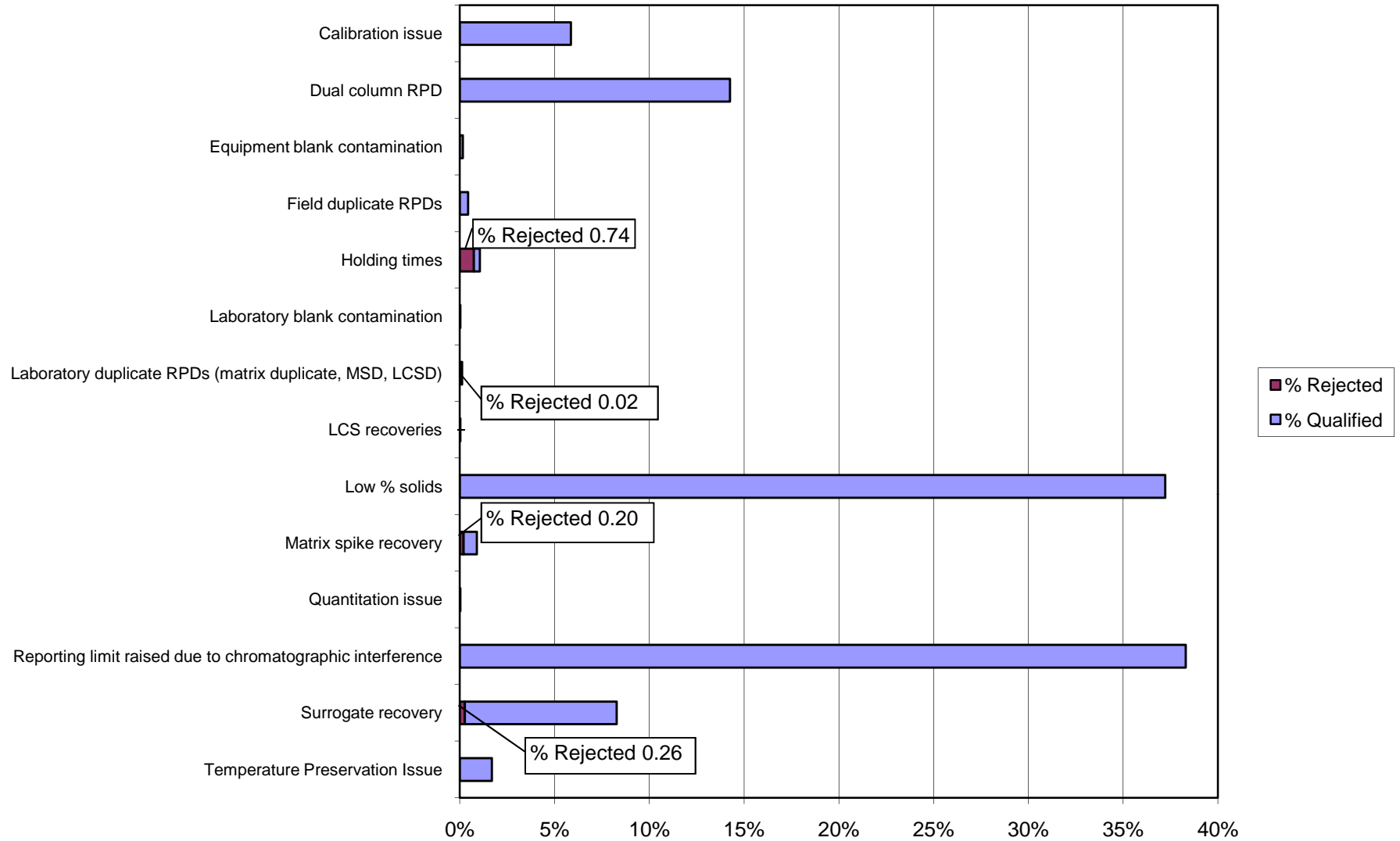


Figure 4-24 Pesticides by HRGC/HRMS Qualification Summary

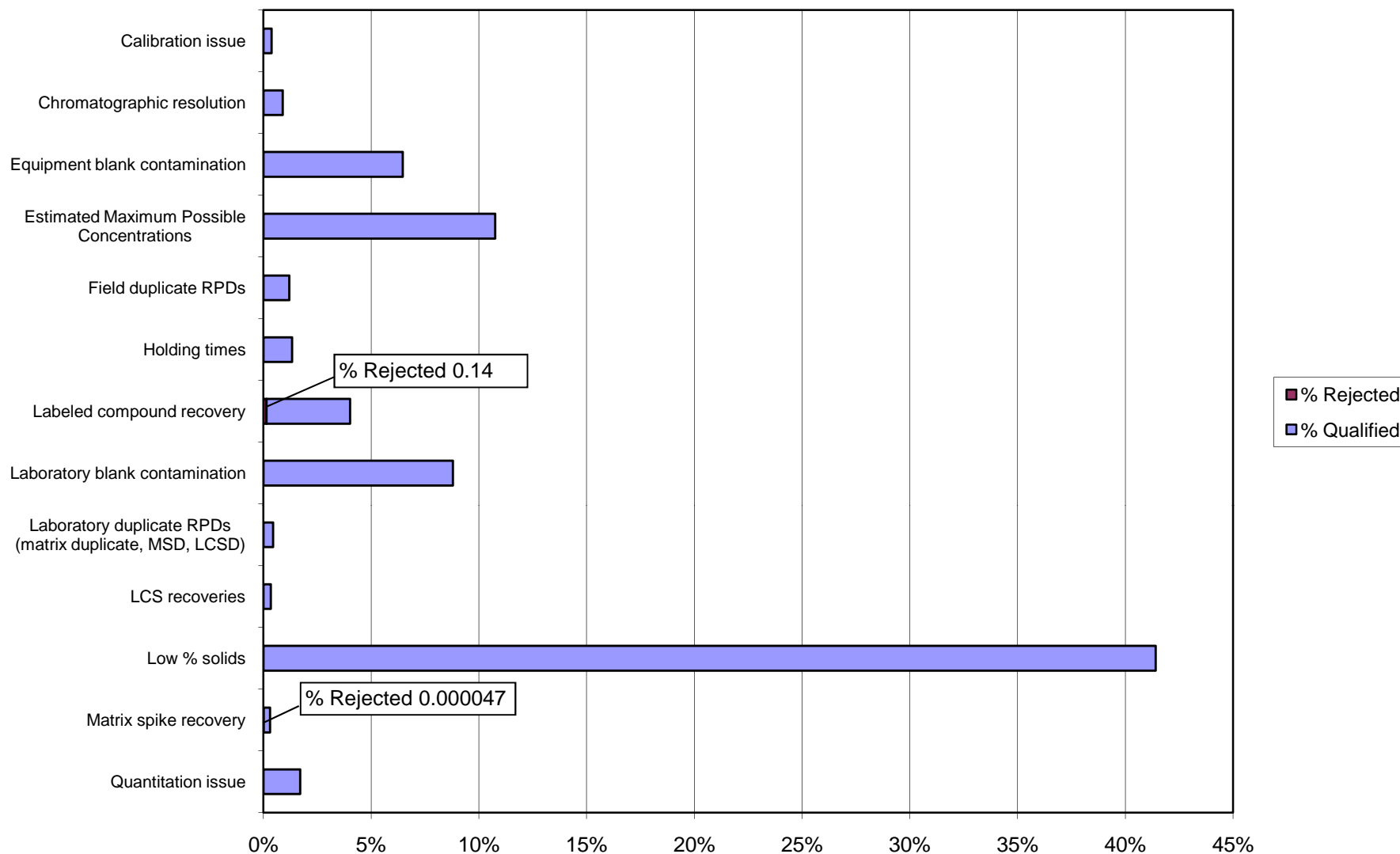


Figure 4-25 Alpha Isotope (Pb-210 as Po-210) Qualification Summary

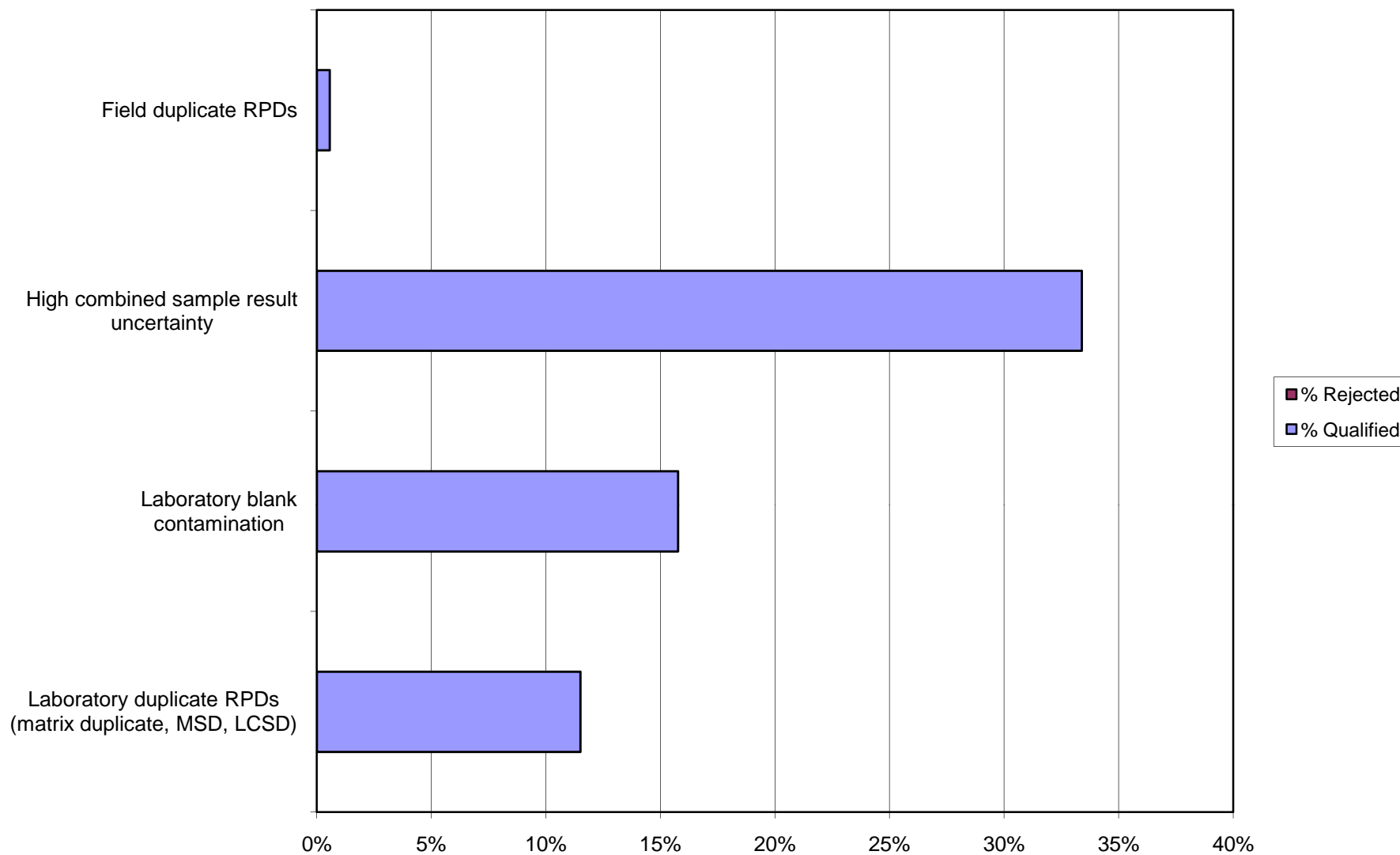


Figure 4-26 Gamma Isotopes (Be-7, Cs-137, K-40, Ra-226) Qualification Summary

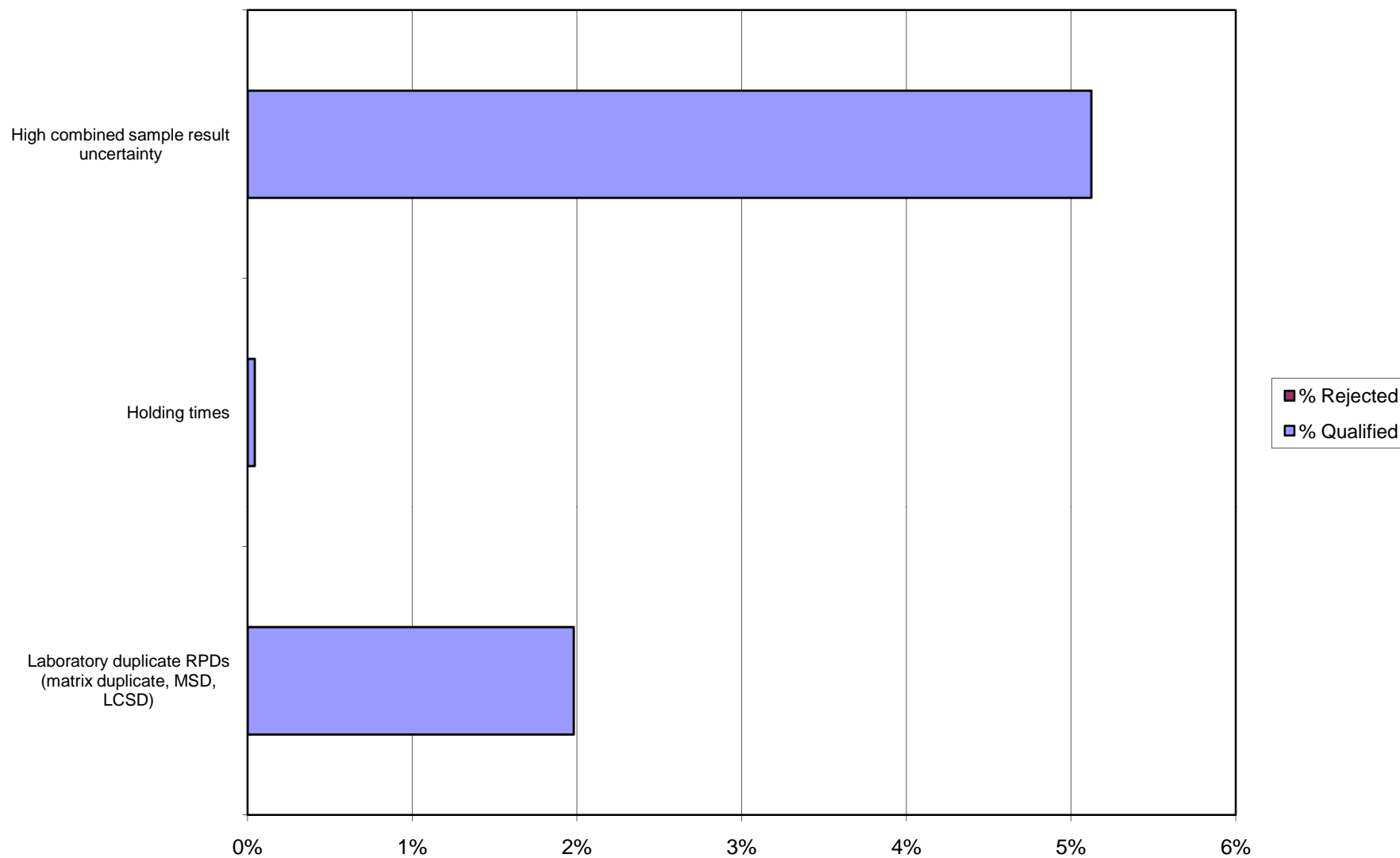


Figure 4-27 SVOC Qualification Summary

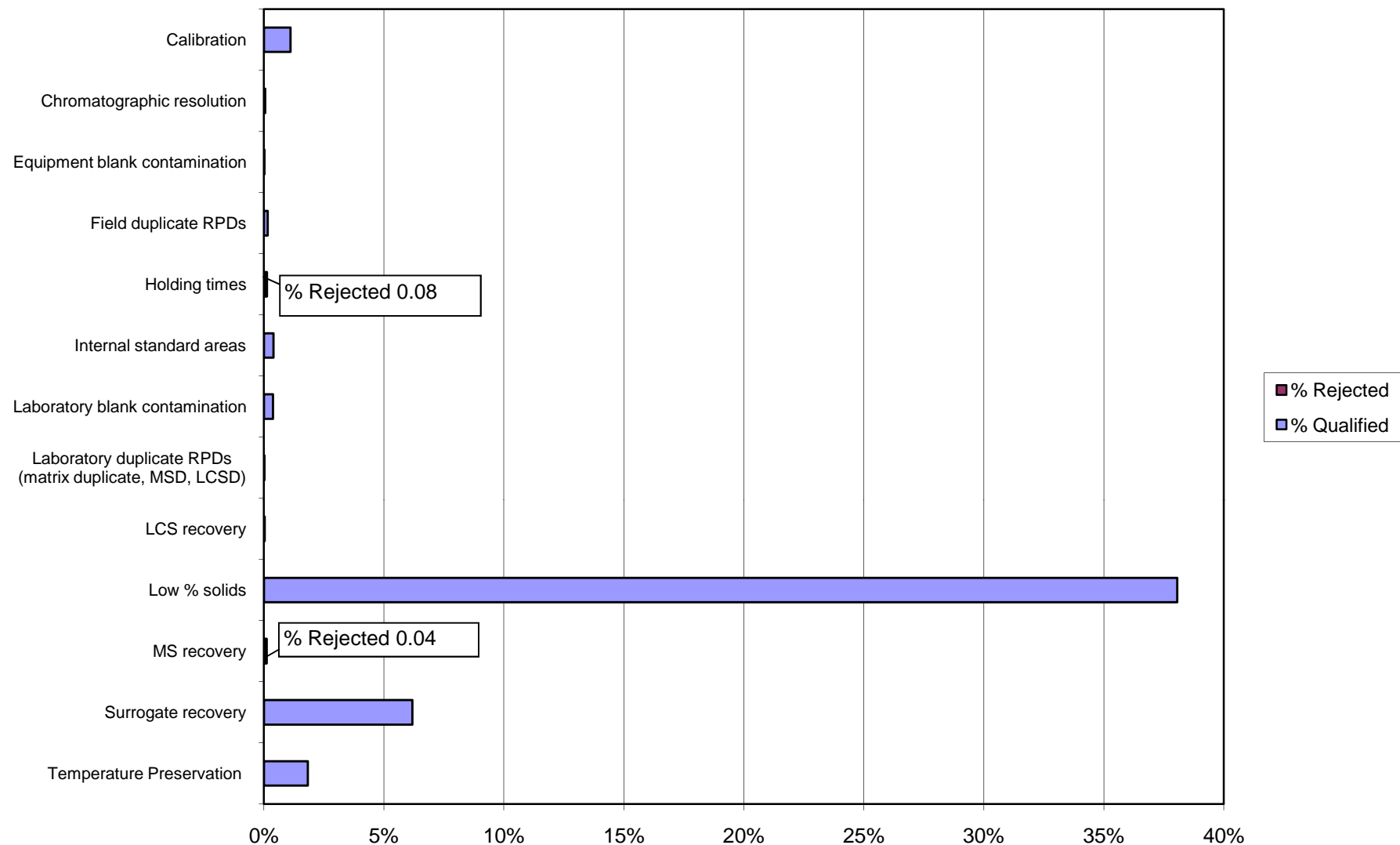


Figure 4-28 TPH-Extractables Qualification Summary

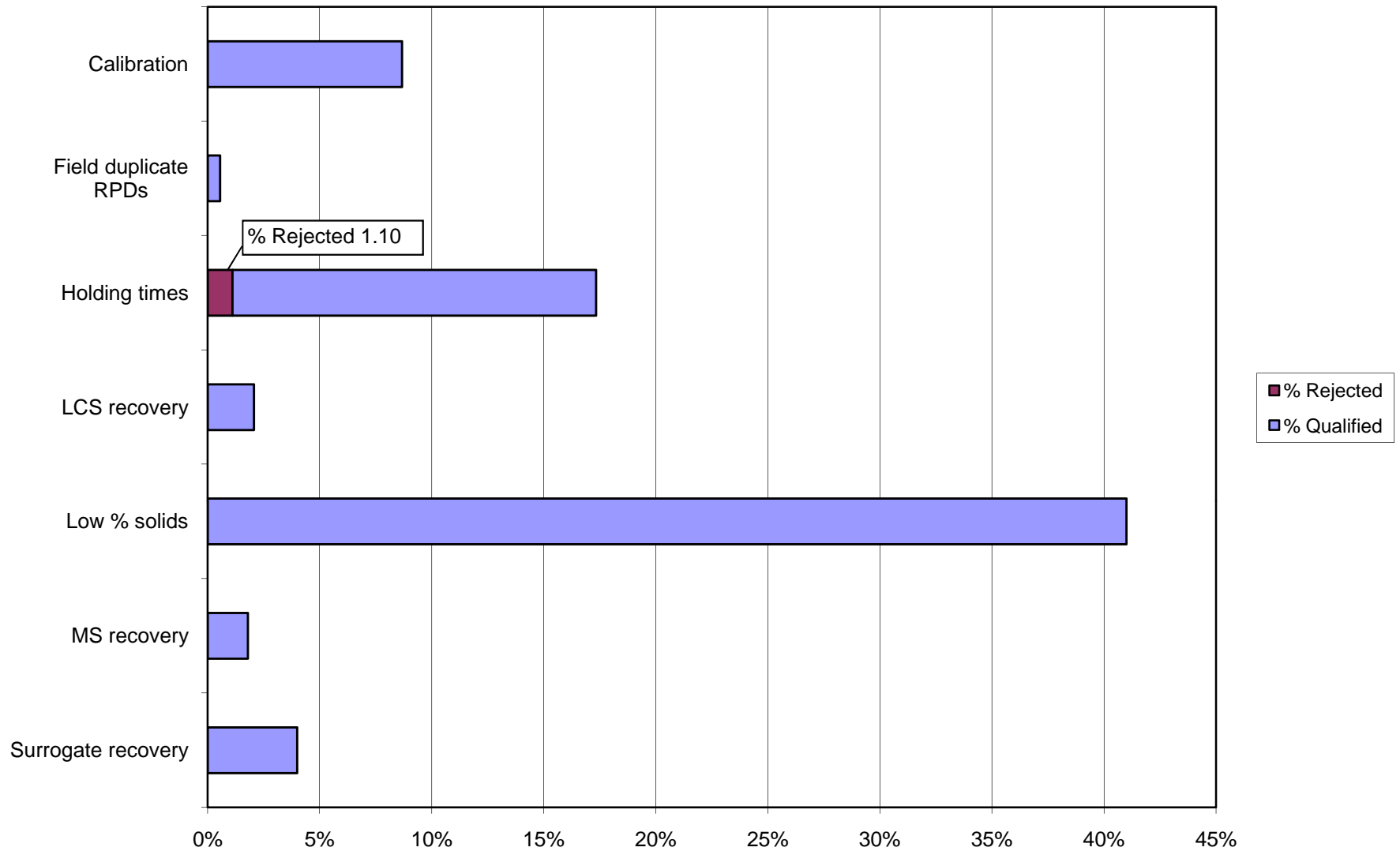


Figure 4-29 TPH-Purgeables Qualification Summary

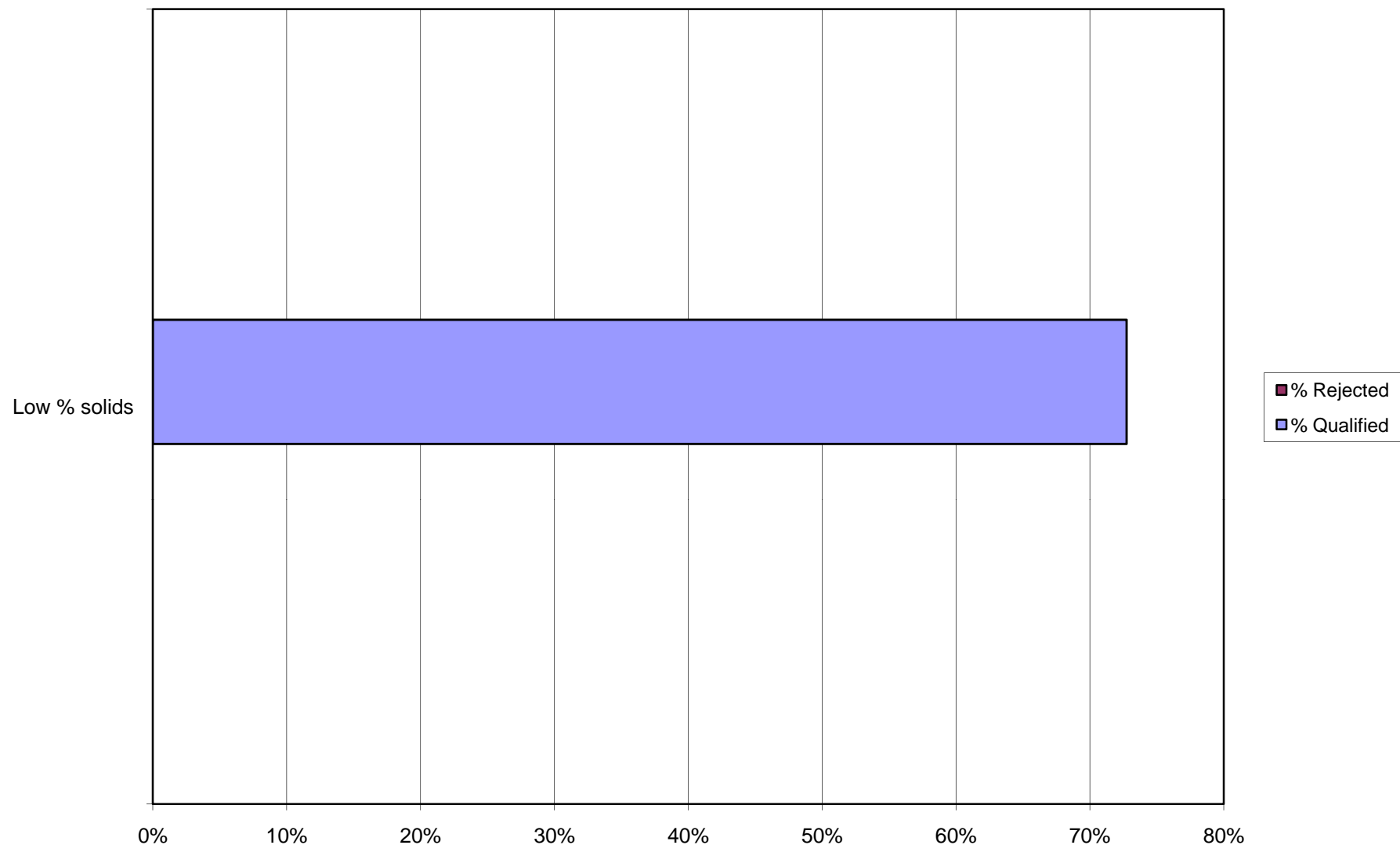


Figure 4-30 VOC Qualification Summary

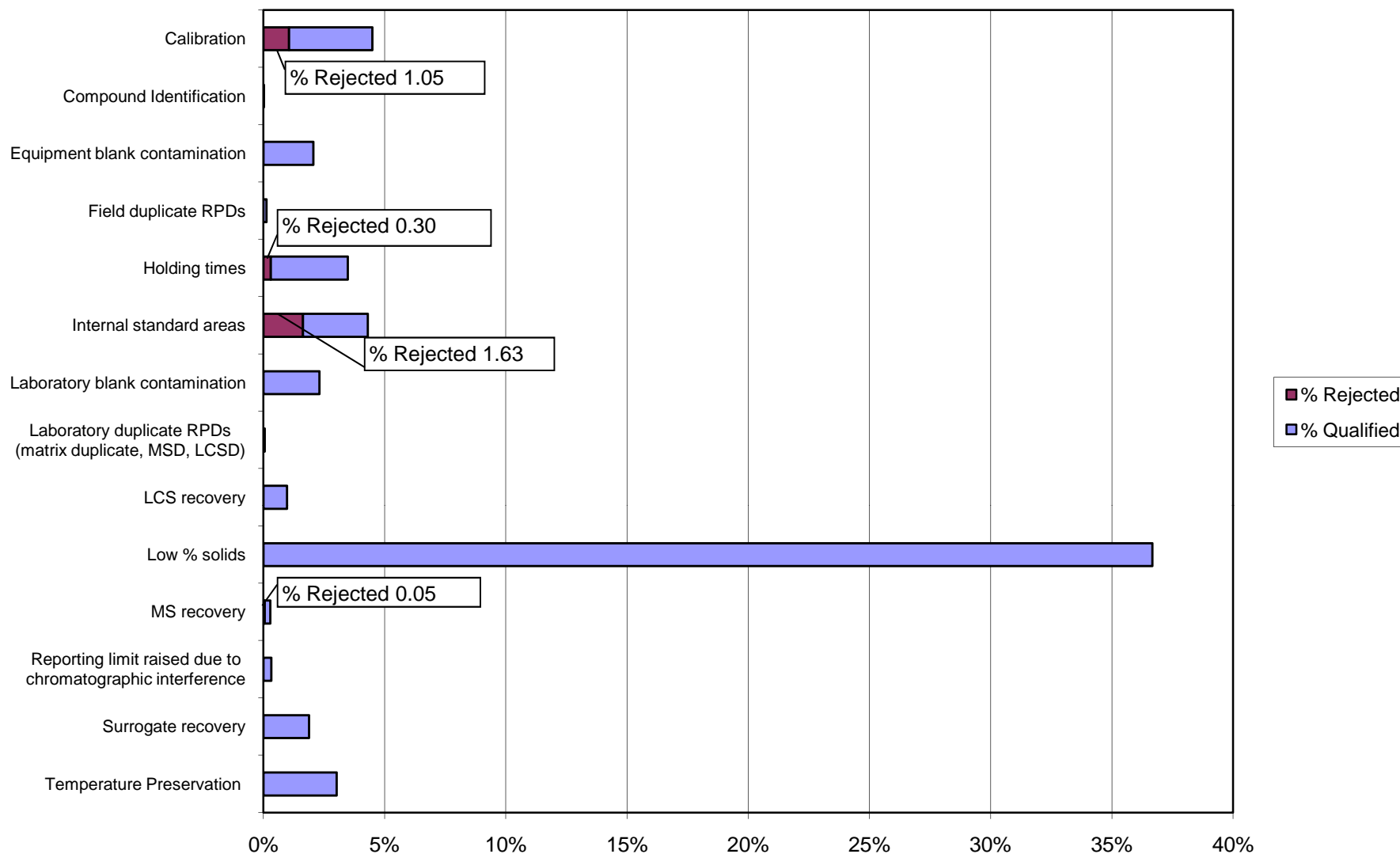
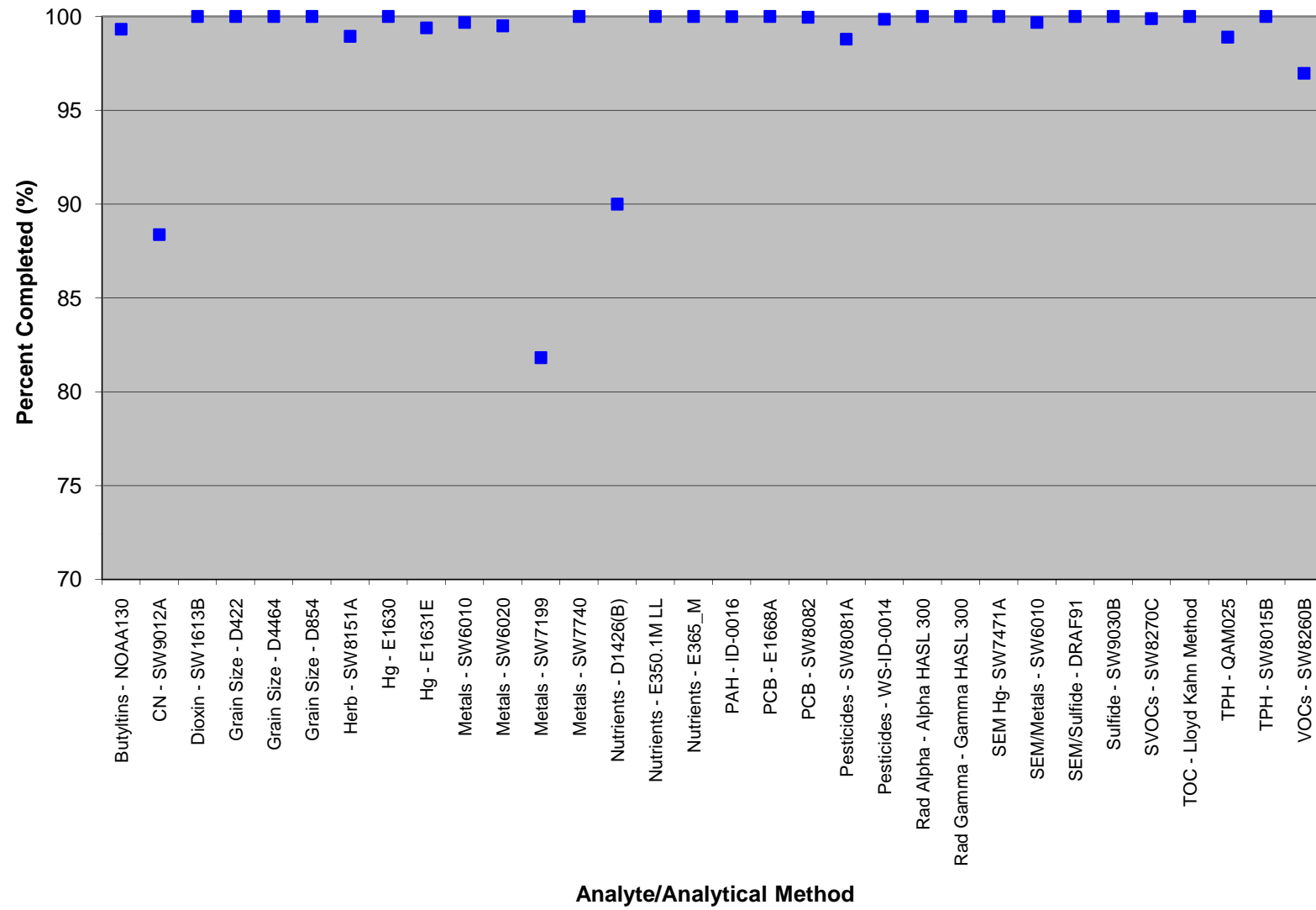


Figure 4-31 Laboratory Completeness Summary



5.0 References

- AECOM, Inc. (AECOM). 2008. Memorandum to USEPA. Memorandum: Finely Segmented Sediment Core Collection and Analysis, Result of Action Items from November 12, 2008, call dated November 28, 2008.
- ASTM International (ASTM). 2009. ASTM D2798: Standard Test Method for Microscopical Determination of the Vitrinite Reflectance of Coal.
- ASTM International (ASTM). 2007. ASTM D 422: Standard Test Method for Particle-Size Analysis of Soils.
- ASTM International (ASTM). 2006. ASTM D854: Standard Test Method for Specific Gravity of Soil Solids by Water Pycnometer.
- ASTM International (ASTM). 2005a. ASTM D 4318: Standard Test Methods for Liquid Limit, Plastic Limit, and Plasticity Index of Soils.
- ASTM International (ASTM). 2005b. Test Method for Microscopical Determination of the Maceral Composition of Coal.
- ASTM International (ASTM). 2004. ASTM D2797: Practice for Preparing Coal Samples for Microscopical Analysis by Reflected Light.
- ASTM International (ASTM). 1993. ASTM D 1426-93B: Standard Test Methods for Ammonia Nitrogen in Water.
- Battelle. 2005. Lower Passaic River Restoration Project. Pathways Analysis Report. Prepared for U.S. Environmental Protection Agency Region 2 and U.S. Army Corps of Engineers. Battelle, Duxbury, Massachusetts.
- CSC Environmental Solutions, 2010. Report on Suspected Causes of Disparities between the Results Produced by Columbia Analytical Services and AXYS Analytical Services in Analysis of Lower Passaic River Sediment Split Samples for Chlorinated Dibenzo-*p*-Dioxins and Dibenzofurans, and Development of a Conversion Factor to Adjust Results between the Two Laboratories.
- CSC Environmental Solutions, 2011. The Effect of Application of a Correction Factor on Chlorinated Dibenzo-*p*-Dioxins and Dibenzofuran Results Produced by Columbia Analytical Services for Lower Passaic River Sediment Samples.
- DOE, 1997. Evaluation of Radiochemical Data Usability. United States Department of Energy.
- ENSR. 2008a. Quality Assurance Project Plan RI Low Resolution Coring/Sediment Sampling Lower Passaic River Restoration Project Newark, New Jersey. May 2, 2008. Revision 1 July 18, 2008; 2 July 24, 2008; 3, July 29, 2008; and 4 October 20, 2008.
- ENSR. 2008b. HASP Addendum. Lower Passaic River Restoration Project Remedial Investigation Low Resolution Coring/Sediment Field Sampling Program Health and Safety Plan Addendum. July 7, 2008. Revision 1, September 22, 2008.
- ENSR. 2007. Data Management Plan. Lower Passaic River Restoration Project. September.

- Ghosh, U., A. S. Weber, J. N. Jensen, and J. R. Smith. 2000. Relationship between PCB desorption equilibrium, kinetics, and availability during land biotreatment. *Environ. Sci. Technol.* 34:2542-2548.
- Ghosh, U., J. R. Zimmerman, and R. G. Luthy. 2003. PCB and PAH speciation among particle types in contaminated harbor sediments and effects on PAH bioavailability. *Environ. Sci. Technol.* 37:2209-2217.
- Iannuzzi T. J. and D. F. Ludwig. 2004. Historical and current ecology of the Lower Passaic River. *Urb Habit* 2(1):3-30.
- Iannuzzi T. J., D. F. Ludwig J. C. Kinnell, J. M. Wallin, W. H. Desvousges, and R. W. Dunford. 2002. A common tragedy: history of an urban river. Amherst Scientific Publishers, Amherst, Massachusetts.
- Khalil, M. F., U. Ghosh, and J. P. Kreitinger. 2006. Role of weathered coal tar pitch in the partitioning of polyaromatic hydrocarbons in manufactured gas plant site sediments. *Environ. Sci. Technol.* 40, 5681-5687.
- Malcolm Pirnie, Inc. (MPI). 2008. "Core Top" Modeling and Risk Assessment Data Needs Lower Passaic River Restoration Project Memorandum to USEPA March 28.
- Malcolm Pirnie, Inc. (MPI). 2007a. Lower Passaic River Restoration Project: Draft source control early action focused feasibility study. Prepared for USEPA, USACE, and New Jersey Department of Transportation. Malcolm Pirnie, Inc., White Plains, New York.
- Malcolm Pirnie, Inc. (MPI). 2007b. Lower Passaic River Restoration Project: Conceptual site model. Prepared for USEPA, USACE, and New Jersey Department of Transportation/Office of Maritime Resources. Malcolm Pirnie, Inc., White Plains, New York.
- Malcolm Pirnie, Inc. (MPI). 2006. Lower Passaic River Restoration Project. Field Sampling Plan. Volume 1. Prepared for USEPA and USACE, Malcolm Pirnie, Inc., White Plains, New York; January.
- Malcolm Pirnie, Inc. (MPI). 2005a. Lower Passaic River Restoration Project. Work Plan. Prepared for USEPA, and USACE, Malcolm Pirnie, Inc., White Plains, New York; Earth Tech, Inc., Bloomfield, New Jersey; Battelle, Stony Brook, New York. August.
- Malcolm Pirnie, Inc. (MPI). 2005b. Lower Passaic River Restoration Project. Revised Preliminary Draft Field Sampling Plan. Volume 3. Prepared for USEPA, USACE, and New Jersey Department of Transportation/Office of Maritime Resources. Malcolm Pirnie, Inc., White Plains, New York; Earth Tech, Inc., Bloomfield, New Jersey; Battelle, Stony Brook, New York. July.
- Malcolm Pirnie, Inc. (MPI). 2005c. Lower Passaic River Restoration Project. Quality Assurance Project Plan. Prepared for USEPA and USACE. Malcolm Pirnie, Inc., White Plains, New York; Earth Tech, Inc., Bloomfield, New Jersey; Battelle, Stony Brook, New York. August.
- Malcolm Pirnie, Inc. (MPI). 2005d. Lower Passaic River Restoration Project. Health and Safety Plan. Core Document. Final January.
- Malcolm Pirnie, Earth Tech, Battelle. 2006. Lower Passaic River Restoration Project. Draft Field Sampling Plan. Volume 2. Prepared for USEPA, USACE, and New Jersey Department of Transportation/Office of Maritime Resources. Malcolm Pirnie, Inc., White Plains, New York; Earth Tech, Inc., Bloomfield, New Jersey; Battelle, Stony Brook, New York. June.

- Moffat and Nichol. 2009. Lower Passaic River/ Newark Bay Hydrodynamic Modeling. Semiannual EPA/ Cooperating Parties Group Modeling Meeting. March 18-19, 2009.
- New Jersey Department of Environmental Protection (NJDEP). 2008. Quantitation of Semi-Volatile Petroleum Products in Waste, Soil, Sediment, and Sludge. OQA-QAM-025-02/08, Revision 7, 2/25/2008.
- New Jersey Department of Environmental Protection (NJDEP). 2005. Standard Operating Procedure (SOP) for Analytical Data Validation of Hexavalent Chromium. Revision No.2, SOP No. 5.A.10, August 2005.
- United States Army Corps of Engineers (USACE). 2008. Lower Passaic River navigation analysis. USACE New York District, New York, New York.
- United States Environmental Protection Agency (USEPA). 2010a. Recommended Toxicity Equivalence Factors (TEFs) for Human Health Risk Assessments of 2,3,7,8-Tetrachlorodibenzo-p-dioxin and Dioxin-Like Compounds. Office of the Science Advisor, Risk Assessment Forum. EPA/100/R-10/005.
- United States Environmental Protection Agency (USEPA). 2010b. ProUCL Version 4.1.00 Technical Guide (Draft): Statistical Software for Environmental Applications for Data Sets with and without Nondetect Observations. Office of Research and Development. EPA/600/R-07/041. May 2010.
- United States Environmental Protection Agency (USEPA). 2007. Administrative settlement agreement and order on consent for remedial investigation/feasibility study, Lower Passaic River Study Area portion of the Diamond Alkali Superfund site. USEPA Region 2 CERCLA docket no. 02-2007-2009. U.S. Environmental Protection Agency, Region 2, New York, New York.
- United States Environmental Protection Agency (USEPA). 2006a. Guidance on Systematic Planning Using the Data Quality Objectives Process, EPA-QAG4. EPA Docket No. EPA/240/B-06/001. Washington D.C.: United States Environmental Protection Agency, Office of Environmental Information. Available at: <http://www.epa.gov/QUALITY/qs-docs/g4-final.pdf>. February 2006.
- United States Environmental Protection Agency (USEPA). 2006b. Data Quality Assessment: Statistical Methods for Practitioners. EPA QA/G-9S. Office of Environmental Information. EPA/240/B-06/003. February 2006.
- United States Environmental Protection Agency (USEPA). 2004. Multi-Agency Radiological Laboratory Analytical Protocols Manual, NUREG-1576, EPA 402-B-04-001A, NTIS PB2004-105421. U.S. Environmental Protection Agency, Department of Defense, Department of Energy, U.S. Department of Homeland Security, U.S. Nuclear Regulatory Commission, Food and Drug Administration, U.S. Geological Survey, National Institute for Standards and Technology. July 2004.
- United States Environmental Protection Agency (USEPA). 2003. Method 1668A: Chlorinated Biphenyl Congeners in Water, Soil, Sediment, Biosolids, and Tissue. Office of Water. EPA-821-R-07-004.
- United States Environmental Protection Agency (USEPA). 2002. Method 1631, Revision E: Mercury in Water by Oxidation, Purge, and Trap, and Cold Vapor Atomic Fluorescence Spectrometry. EPA-821-R-02-019.
- United States Environmental Protection Agency (USEPA). 2001. Method 1630; Methyl Mercury in Water by Distillation, Aqueous Ethylation, Purge and Trap, and CVAFS. Office of Water. EPA821-R-01-020. Draft, January 2001.

United States Environmental Protection Agency (USEPA). 1993. Manual of Methods for Chemical Analysis of Water and Wastes (EPA-600/4-79-020) Method 350.1, Determination of Ammonia Nitrogen by Semi-Automated Colorimetry and modified by the laboratory for use with sediment matrices.

United States Environmental Protection Agency (USEPA). 1991. Draft Analytical Method for Determination of Acid Volatile Sulfide in Sediment, 821/R-91-100.

United States Environmental Protection Agency (USEPA). 1988a. Guidance for Conducting Remedial Investigations and Feasibility Studies under CERCLA, Interim Final EPA 540/G-89/004, OSWER 9355.3-01 October.

United States Environmental Protection Agency (USEPA). 1988b. Determination of Total Organic Carbon in Sediment. Prepared by Lloyd Kahn. Region II, Environmental Services Division, Edison, New Jersey.

United States Environmental Protection Agency (USEPA). 1986. Test Methods for Evaluating Solid Waste, Physical/Chemical Methods (SW-846). Third Edition. Includes all current revisions.

United States Environmental Protection Agency (USEPA). 1983. Methods for Chemical Analysis of Water and Wastes. EPA-600/4-79-020.

United States Environmental Protection Agency (USEPA). 1980 U.S. Code Title 42--The Public Health and Welfare Chapter 103, Comprehensive Environmental Response, Compensation, and Liability Subchapter I December 11, 1980 and as amended 1986, 2002.

United States Department of Energy (DOE). 1997a. Evaluation of Radiochemical Data Usability.

United States Department of Energy (DOE). 1997b. EML Procedures Manual.

Appendix A

Data Quality Objectives

Appendix B

Field Modification/Nonconformance Forms

Appendix C

Ambient Air Monitoring from Process Tent and within Warehouse

Appendix D

Sample Summary Table

Table D-1

Sample Summary Table

Table D-1
Sample Summary Table

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatiles Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
001	08A-0001-C1AS	08A-001-C1	11/18/2008 7:30	0	0.5			1				1								1			1	1	1	1					
	08A-0001-C1BS	08A-001-C1	11/20/2008 7:30	0.5	1.5							1				1		1		1			1	1	1	1	1		1		
	08A-0001-C1CS	08A-001-C1	11/20/2008 7:30	1.5	2.5							1				1		1		1			1	1	1	1	1		1		
	08A-0001-C1DS	08A-001-C1	11/20/2008 7:30	2.5	3.5							1						1		1			1	1	1	1	1				1
	08A-0001-C1ES	08A-001-C1	11/20/2008 7:30	3.5	5.5							1		1	1	1		1		1			1	1	1	1	1				
	08A-0001-C1FS	08A-001-C1	11/20/2008 7:30	5.5	7.5				1		1	1				1		1	1	1	1		1	1	1	1	1		1		
	08A-0001-C1GS	08A-001-C1	11/20/2008 7:30	7.5	9.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0001-C1HS	08A-001-C1	11/20/2008 7:30	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0001-C1IS	08A-001-C1	11/20/2008 7:30	11.5	13.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0001-C1JS	08A-001-C1	11/20/2008 7:30	13.5	15.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0001-C1KS	08A-001-C1	11/20/2008 7:30	15.5	17.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		1
	08A-0001-C2AS	08A-001-C2	11/20/2008 8:41	0	0.5		1		1		1			1	1	1		1			1						1		1		
	08A-0001-C2BS	08A-001-C2	11/20/2008 8:41	0.5	1.5				1		1			1	1				1		1										
	08A-0001-C2CS	08A-001-C2	11/20/2008 8:41	1.5	2.5				1		1			1	1						1										
	08A-0001-C2DS	08A-001-C2	11/20/2008 8:41	2.5	3.5				1		1			1	1	1			1		1								1		
	08A-0001-C2ES	08A-001-C2	11/20/2008 8:41	3.5	5.5				1		1										1								1		
	08A-0001-C2FS	08A-001-C2	11/20/2008 8:41	5.5	7.5									1	1																
	08A-0001-G1AS	08A-001-G1	11/20/2008 9:15	0	0.1			1																							
	08A-0001-G1BS	08A-001-G1	11/20/2008 9:15	0.1	0.5								1																		
	08A-0001-G2AS	08A-001-G2	11/20/2008 9:24	0	0.5	1											1					1								1	1
	08A-0001-G3AS	08A-001-G3	11/20/2008 9:37	0	0.5					1																		1			
002	08A-0002-C1AS	08A-002-C1	11/11/2008 7:29	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0002-C1BS	08A-002-C1	11/11/2008 7:29	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0002-C1CS	08A-002-C1	11/11/2008 7:29	1.5	2.5							1				1		1		1			1	1	1	1	1				
	08A-0002-C1DS	08A-002-C1	11/11/2008 7:29	2.5	3.5				1		1	1				1		1	1	1	1		1	1	1	1	1				1
	08A-0002-C1ES	08A-002-C1	11/11/2008 7:29	3.5	5.5				1		1	1		1	1			1	1	1	1			1	1	1			1		
	08A-0002-C1FS	08A-002-C1	11/11/2008 7:29	5.5	6.75				1		1	1						1		1	1			1	1	1			1		
	08A-0002-C1GS	08A-002-C1	11/11/2008 7:29	6.75	8						1				1					1	1				1		1		1		1
	08A-0002-C2AS	08A-002-C2	11/11/2008 8:21	0	0.5				1		1			1	1	1					1								1		
	08A-0002-C2BS	08A-002-C2	11/11/2008 8:21	0.5	1.5									1	1	1													1		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0002-C2CS	08A-002-C2	11/11/2008 8:21	1.5	2.5				1		1			1	1						1								1		
	08A-0002-C2DS	08A-002-C2	11/11/2008 8:21	2.5	3.5						1			1	1						1								1		
	08A-0002-C2ES	08A-002-C2	11/11/2008 8:21	3.5	5.5											1						1				1					
	08A-0002-C2FS	08A-002-C2	11/11/2008 8:21	5.5	7									1	1	1						1				1					
	08A-0002-G1AS	08A-002-G1	11/11/2008 9:01	0	0.1			1																							
	08A-0002-G1BS	08A-002-G1	11/11/2008 9:01	0.1	0.5								1																		
	08A-0002-G2AS	08A-002-G2	11/11/2008 9:10	0	0.5					1																	1				1
003	08A-0003-C1AS	08A-003-C1	11/11/2008 9:50	0	0.5			1			1							1		1			1	1	1	1					
	08A-0003-C1BS	08A-003-C1	11/11/2008 9:50	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0003-C1CS	08A-003-C1	11/11/2008 9:50	1.5	2.5				1		1	1						1		1	1		1	1	1	1	1				
	08A-0003-C1DS	08A-003-C1	11/11/2008 9:50	2.5	3.5						1					1				1			1	1	1	1	1			1	1
	08A-0003-C1ES	08A-003-C1	11/11/2008 9:50	3.5	5.5				1		1	1		1	1	1			1		1		1	1	1	1	1		1		
	08A-0003-C1FS	08A-003-C1	11/11/2008 9:50	5.5	7.5				1		1	1		1	1	1			1	1	1		1	1	1	1	1		1		
	08A-0003-C1GS	08A-003-C1	11/11/2008 9:50	7.5	9.5				1		1	1		1	1	1			1		1		1	1	1	1	1		1		
	08A-0003-C1HS	08A-003-C1	11/11/2008 9:50	9.5	10.75				1		1	1		1	1	1			1	1	1		1	1	1	1	1		1		
	08A-0003-C1IS	08A-003-C1	11/11/2008 9:50	10.75	12						1				1					1	1				1		1		1		1
	08A-0003-C2AS	08A-003-C2	11/11/2008 10:53	0	0.5				1		1			1	1	1					1						1		1		
	08A-0003-C2BS	08A-003-C2	11/11/2008 10:53	0.5	1.5									1	1	1													1		
	08A-0003-C2CS	08A-003-C2	11/11/2008 10:53	1.5	2.5									1	1	1													1		
	08A-0003-C2DS	08A-003-C2	11/11/2008 10:53	2.5	3.5				1		1			1	1				1		1										
	08A-0003-G1AS	08A-003-G1	11/11/2008 11:14	0	0.1			1																							
	08A-0003-G1BS	08A-003-G1	11/11/2008 11:14	0.1	0.5								1																		
	08A-0003-G2AS	08A-003-G2	11/11/2008 11:24	0	0.5					1																	1				1
004	08A-0004-C1AS	08A-004-C1	11/25/2008 7:57	0	0.5			1				1						1		1			1	1	1	1					
	08A-0004-C1BS	08A-004-C1	11/25/2008 7:57	0.5	1.5							1				1				1			1	1	1	1	1				
	08A-0004-C1CS	08A-004-C1	11/25/2008 7:57	1.5	2.5				1		1	1						1		1	1		1	1	1	1	1				
	08A-0004-C1DS	08A-004-C1	11/25/2008 7:57	2.5	3.5							1				1				1			1	1	1	1	1				1
	08A-0004-C1ES	08A-004-C1	11/25/2008 7:57	3.5	5.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0004-C1FS	08A-004-C1	11/25/2008 7:57	5.5	7.5				1		1	1				1			1	1	1		1	1	1	1	1				
	08A-0004-C1GS	08A-004-C1	11/25/2008 7:57	7.5	9.5				1		1	1		1	1	1			1		1		1	1	1	1	1		1		
	08A-0004-C1HS	08A-004-C1	11/25/2008 7:57	9.5	11.5				1		1	1		1	1	1			1	1	1		1	1	1	1	1		1		
	08A-0004-C1IS	08A-004-C1	11/25/2008 7:57	11.5	13.5				1		1	1		1	1	1			1		1		1	1	1	1	1		1		
	08A-0004-C1JS	08A-004-C1	11/25/2008 7:57	13.5	15.5				1		1	1		1	1	1			1	1	1		1	1	1	1	1		1		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0004-C1KS	08A-004-C1	11/25/2008 7:57	15.5	17.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0004-C1LS	08A-004-C1	11/25/2008 7:57	17.5	19.1				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0004-C2AS	08A-004-C2	11/25/2008 8:56	0	0.5				1		1			1	1	1					1						1		1		
	08A-0004-C2BS	08A-004-C2	11/25/2008 8:56	0.5	1.5				1		1			1	1				1		1								1		
	08A-0004-C2CS	08A-004-C2	11/25/2008 8:56	1.5	2.5									1	1	1													1		
	08A-0004-C2DS	08A-004-C2	11/25/2008 8:56	2.5	3.5				1		1			1	1				1		1								1		
	08A-0004-C2ES	08A-004-C2	11/25/2008 8:56	3.5	5.5									1	1	1					1								1		
	08A-0004-C2FS	08A-004-C2	11/25/2008 8:56	5.5	7.5									1	1														1		
	08A-0004-G1AS	08A-004-G1	11/25/2008 9:24	0	0.1			1																							
	08A-0004-G1BS	08A-004-G1	11/25/2008 9:24	0.1	0.5								1																		
	08A-0004-G2AS	08A-004-G2	11/25/2008 9:33	0	0.5					1																		1			1
005	08A-0005-C1AS	08A-005-C1	11/12/2008 11:42	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0005-C1BS	08A-005-C1	11/12/2008 11:42	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0005-C1CS	08A-005-C1	11/12/2008 11:42	1.5	2.5				1		1	1						1		1	1		1	1	1	1	1				
	08A-0005-C1DS	08A-005-C1	11/12/2008 11:42	2.5	3.5							1				1		1		1			1	1	1	1	1				1
	08A-0005-C1ES	08A-005-C1	11/12/2008 11:42	3.5	5.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0005-C1FS	08A-005-C1	11/12/2008 11:42	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0005-C1GS	08A-005-C1	11/12/2008 11:42	7.5	9.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0005-C1HS	08A-005-C1	11/12/2008 11:42	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0005-C2AS	08A-005-C2	11/12/2008 12:20	0	0.5				1		1			1	1	1					1								1		
	08A-0005-C2BS	08A-005-C2	11/12/2008 12:20	0.5	1.5				1		1			1	1				1		1								1		
	08A-0005-C2CS	08A-005-C2	11/12/2008 12:20	1.5	2.5									1	1	1													1		
	08A-0005-C2DS	08A-005-C2	11/12/2008 12:20	2.5	3.5				1		1			1	1					1		1							1		
	08A-0005-G1AS	08A-005-G1	11/12/2008 12:45	0	0.1			1																							
	08A-0005-G1BS	08A-005-G1	11/12/2008 12:45	0.1	0.5									1																	
	08A-0005-G2AS	08A-005-G2	11/12/2008 12:55	0	0.5						1																		1		
006	08A-0006-C1AS	08A-006-C1	11/18/2008 8:15	0	0.5			1				1								1				1	1	1					
	08A-0006-C1BS	08A-006-C1	11/18/2008 8:15	0.5	1.5							1						1						1	1	1			1		
	08A-0006-C1CS	08A-006-C1	11/18/2008 8:15	1.5	2.5							1						1		1			1	1	1	1					
	08A-0006-C1DS	08A-006-C1	11/18/2008 8:15	2.5	3.5							1						1						1	1	1			1		1
	08A-0006-C1ES	08A-006-C1	11/18/2008 8:15	3.5	5.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0006-C1FS	08A-006-C1	11/18/2008 8:15	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0006-C1GS	08A-006-C1	11/18/2008 8:15	7.5	9.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0006-C1HS	08A-006-C1	11/18/2008 8:15	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0006-C1IS	08A-006-C1	11/18/2008 8:15	11.5	13.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0006-C1JS	08A-006-C1	11/18/2008 8:15	13.5	15.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0006-C1KS	08A-006-C1	11/18/2008 8:15	15.5	16.9				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		1
	08A-0006-C2AS	08A-006-C2	11/18/2008 9:29	0	0.5				1		1					1		1			1		1				1				
	08A-0006-C2BS	08A-006-C2	11/18/2008 9:29	0.5	1.5				1		1			1	1				1	1	1										
	08A-0006-C2CS	08A-006-C2	11/18/2008 9:29	1.5	2.5				1		1					1					1						1		1		
	08A-0006-C2DS	08A-006-C2	11/18/2008 9:29	2.5	3.5				1		1			1	1				1	1	1								1		
	08A-0006-C3AS	08A-006-C3	11/18/2008 9:49	0	0.5									1	1														1		
	08A-0006-C3BS	08A-006-C3	11/18/2008 9:49	0.5	1.5											1							1				1				
	08A-0006-C3CS	08A-006-C3	11/18/2008 9:49	1.5	2.5									1	1																
	08A-0006-C3DS	08A-006-C3	11/18/2008 9:49	2.5	3.5											1							1				1				
	08A-0006-G1AS	08A-006-G1	11/18/2008 10:05	0	0.1			1																							
	08A-0006-G1BS	08A-006-G1	11/18/2008 10:05	0.1	0.5								1																		
	08A-0006-G2AS	08A-006-G2	11/18/2008 10:12	0	0.5					1																		1			1
007	08A-0007-C1AS	08A-007-C1	11/19/2008 10:22	0	0.5		1		1		1			1	1	1					1						1		1		
	08A-0007-C1BS	08A-007-C1	11/19/2008 10:22	0.5	1.5									1	1	1													1		
	08A-0007-C1CS	08A-007-C1	11/19/2008 10:22	1.5	2.5				1		1			1	1						1										
	08A-0007-C1DS	08A-007-C1	11/19/2008 10:22	2.5	3.5				1		1			1	1						1								1		
	08A-0007-C2AS	08A-007-C2	11/19/2008 11:50	0	0.5			1				1						1		1			1	1	1	1					
	08A-0007-C2BS	08A-007-C2	11/19/2008 11:50	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0007-C2CS	08A-007-C2	11/19/2008 11:50	1.5	2.5							1				1		1		1			1	1	1	1	1		1		
	08A-0007-C2DS	08A-007-C2	11/19/2008 11:50	2.5	3.5							1				1		1		1			1	1	1	1	1				1
	08A-0007-C2ES	08A-007-C2	11/19/2008 11:50	3.5	5.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0007-C2FS	08A-007-C2	11/19/2008 11:50	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0007-C2GS	08A-007-C2	11/19/2008 11:50	7.5	9.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0007-C2HS	08A-007-C2	11/19/2008 11:50	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0007-C2IS	08A-007-C2	11/19/2008 11:50	11.5	13.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0007-C2JS	08A-007-C2	11/19/2008 11:50	13.5	15.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0007-C2KS	08A-007-C2	11/19/2008 11:50	15.5	17.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0007-C2LS	08A-007-C2	11/19/2008 11:50	17.5	19.1				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0007-G1AS	08A-007-G1	11/19/2008 13:05	0	0.1			1																							
	08A-0007-G1BS	08A-007-G1	11/19/2008 13:05	0.1	0.5								1																		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0007-G2AS	08A-007-G2	11/19/2008 13:15	0	0.5	1											1					1								1	1
	08A-0007-G3AS	08A-007-G3	11/19/2008 13:35	0.1	0.5					1							1					1						1			
008	08A-0008-C1AS	08A-008-C1	11/24/2008 8:07	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0008-C1BS	08A-008-C1	11/24/2008 8:07	0.5	1.5				1		1	1						1		1	1		1	1	1	1	1				
	08A-0008-C1CS	08A-008-C1	11/24/2008 8:07	1.5	2.5							1				1		1		1			1	1	1	1	1		1		
	08A-0008-C1DS	08A-008-C1	11/24/2008 8:07	2.5	3.5							1				1		1		1			1	1	1	1	1		1		1
	08A-0008-C1ES	08A-008-C1	11/24/2008 8:07	3.5	5.5							1				1		1		1			1	1	1	1	1		1		
	08A-0008-C1FS	08A-008-C1	11/24/2008 8:07	5.5	7.5				1		1	1				1		1		1	1		1	1	1	1	1				
	08A-0008-C1GS	08A-008-C1	11/24/2008 8:07	7.5	9.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0008-C1HS	08A-008-C1	11/24/2008 8:07	9.5	11.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0008-C1IS	08A-008-C1	11/24/2008 8:07	11.5	13.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0008-C1JS	08A-008-C1	11/24/2008 8:07	13.5	15.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0008-C1KS	08A-008-C1	11/24/2008 8:07	15.5	16.23							1						1		1			1	1	1	1	1				1
	08A-0008-C2AS	08A-008-C2	11/24/2008 9:17	0	0.5				1		1			1	1	1					1								1		
	08A-0008-C2BS	08A-008-C2	11/24/2008 9:17	0.5	1.5									1	1	1													1		
	08A-0008-C2CS	08A-008-C2	11/24/2008 9:17	1.5	2.5				1		1			1	1				1		1										
	08A-0008-C2DS	08A-008-C2	11/24/2008 9:17	2.5	3.5				1		1			1	1						1										
	08A-0008-C2ES	08A-008-C2	11/24/2008 9:17	3.5	5.5				1		1			1	1				1		1										
	08A-0008-C2FS	08A-008-C2	11/24/2008 9:17	5.5	7.5									1	1														1		
	08A-0008-G1AS	08A-008-G1	11/24/2008 9:46	0	0.1			1																							
	08A-0008-G1BS	08A-008-G1	11/24/2008 9:46	0.1	0.5								1																		
	08A-0008-G2AS	08A-008-G2	11/24/2008 9:55	0	0.5					1																		1			1
009	08A-0009-C1AS	08A-009-C1	11/10/2008 9:20	0	0.5				1		1			1	1						1									1	
	08A-0009-C1BS	08A-009-C1	11/10/2008 9:20	0.5	1.5				1		1			1	1						1										
	08A-0009-C1CS	08A-009-C1	11/10/2008 9:20	1.5	2.5									1	1	1													1		
	08A-0009-C1DS	08A-009-C1	11/10/2008 9:20	2.5	3.5				1		1			1	1						1								1		
	08A-0009-C3AS	08A-009-C3	11/10/2008 10:58	0	0.5			1				1				1		1		1			1	1	1	1	1				
	08A-0009-C3BS	08A-009-C3	11/10/2008 10:58	0.5	1.5							1				1		1		1			1	1	1	1	1		1		
	08A-0009-C3CS	08A-009-C3	11/10/2008 10:58	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0009-C3DS	08A-009-C3	11/10/2008 10:58	2.5	3.5						1					1		1		1			1	1	1	1	1				1
	08A-0009-C3ES	08A-009-C3	11/10/2008 10:58	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0009-C3FS	08A-009-C3	11/10/2008 10:58	5.5	7.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0009-C3GS	08A-009-C3	11/10/2008 10:58	7.5	9.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0009-C3HS	08A-009-C3	11/10/2008 10:58	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0009-C3IS	08A-009-C3	11/10/2008 10:58	11.5	12.6				1		1	1		1	1			1	1	1	1		1	1	1	1	1				1
	08A-0009-G1AS	08A-009-G1	11/10/2008 11:39	0	0.1			1																							
	08A-0009-G1BS	08A-009-G1	11/10/2008 11:39	0.1	0.5								1																		
	08A-0009-G2AS	08A-009-G2	11/10/2008 11:45	0	0.5					1																		1			1
010	08A-0010-C1AS	08A-010-C1	12/8/2008 7:47	0	0.5				1		1			1	1	1					1								1		
	08A-0010-C1BS	08A-010-C1	12/8/2008 7:47	0.5	1.5				1		1			1	1				1		1								1		
	08A-0010-C1CS	08A-010-C1	12/8/2008 7:47	1.5	2.5				1		1			1	1						1										
	08A-0010-C1DS	08A-010-C1	12/8/2008 7:47	2.5	3.5				1		1			1	1				1		1										
	08A-0010-C1ES	08A-010-C1	12/8/2008 7:47	3.5	5.5				1		1			1	1				1		1										
	08A-0010-C1FS	08A-010-C1	12/8/2008 7:47	5.5	7.5				1		1					1			1		1								1		
	08A-0010-C2AS	08A-010-C2	12/8/2008 9:25	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0010-C2BS	08A-010-C2	12/8/2008 9:25	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0010-C2CS	08A-010-C2	12/8/2008 9:25	1.5	2.5							1				1		1		1			1	1	1	1	1		1		
	08A-0010-C2DS	08A-010-C2	12/8/2008 9:25	2.5	3.5							1				1		1		1			1	1	1	1	1		1		1
	08A-0010-C2ES	08A-010-C2	12/8/2008 9:25	3.5	5.5							1				1		1		1			1	1	1	1	1		1		
	08A-0010-C2FS	08A-010-C2	12/8/2008 9:25	5.5	7.5							1		1	1			1		1			1	1	1	1	1				
	08A-0010-C2GS	08A-010-C2	12/8/2008 9:25	7.5	9.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0010-C2HS	08A-010-C2	12/8/2008 9:25	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0010-C2IS	08A-010-C2	12/8/2008 9:25	11.5	13.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0010-C2JS	08A-010-C2	12/8/2008 9:25	13.5	15.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0010-C2KS	08A-010-C2	12/8/2008 9:25	15.5	17.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0010-C2LS	08A-010-C2	12/8/2008 9:25	17.5	19.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0010-C2MS	08A-010-C2	12/8/2008 9:25	19.5	21.75				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		1
	08A-0010-G1AS	08A-010-G1	12/8/2008 8:45	0	0.1			1																							
	08A-0010-G1BS	08A-010-G1	12/8/2008 8:45	0.1	0.5								1																		
	08A-0010-G2AS	08A-010-G2	12/8/2008 8:53	0	0.5					1																		1			1
011	08A-0011-C1AS	08A-011-C1	11/13/2008 7:11	0	0.5			1				1				1		1		1			1	1	1	1	1				
	08A-0011-C1BS	08A-011-C1	11/13/2008 7:11	0.5	1.5							1				1		1		1			1	1	1	1	1		1		
	08A-0011-C1CS	08A-011-C1	11/13/2008 7:11	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0011-C1DS	08A-011-C1	11/13/2008 7:11	2.5	3.5				1		1	1						1		1	1		1	1	1	1	1				1
	08A-0011-C1ES	08A-011-C1	11/13/2008 7:11	3.5	5.5				1		1	1				1		1	1	1	1		1	1	1	1	1		1		
	08A-0011-C1FS	08A-011-C1	11/13/2008 7:11	5.5	7.5							1		1	1	1		1		1			1	1	1	1	1				

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0011-C1GS	08A-011-C1	11/13/2008 7:11	7.5	9.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0011-C1HS	08A-011-C1	11/13/2008 7:11	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0011-C1IS	08A-011-C1	11/13/2008 7:11	11.5	13.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0011-C1JS	08A-011-C1	11/13/2008 7:11	13.5	15.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0011-C1KS	08A-011-C1	11/13/2008 7:11	15.5	17.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0011-C1LS	08A-011-C1	11/13/2008 7:11	17.5	19.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0011-C1MS	08A-011-C1	11/13/2008 7:11	19.5	20.23							1		1	1			1		1			1	1	1	1					1
	08A-0011-C2AS	08A-011-C2	11/13/2008 8:08	0	0.5				1		1			1	1						1								1		
	08A-0011-C2BS	08A-011-C2	11/13/2008 8:08	0.5	1.5				1		1			1	1						1										
	08A-0011-C2CS	08A-011-C2	11/13/2008 8:08	1.5	2.5									1	1	1													1		
	08A-0011-C2DS	08A-011-C2	11/13/2008 8:08	2.5	3.5									1	1	1													1		
	08A-0011-C2ES	08A-011-C2	11/13/2008 8:08	3.5	5.5									1	1																
	08A-0011-C2FS	08A-011-C2	11/13/2008 8:08	5.5	7.5				1		1								1		1								1		
	08A-0011-G1AS	08A-011-G1	11/13/2008 8:33	0	0.1			1																							
	08A-0011-G1BS	08A-011-G1	11/13/2008 8:33	0.1	0.5								1																		
	08A-0011-G2AS	08A-011-G2	11/13/2008 8:40	0	0.5					1																	1				1
012	08A-0012-C1AS	08A-012-C1	12/4/2008 7:17	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0012-C1BS	08A-012-C1	12/4/2008 7:17	0.5	1.5							1						1		1			1	1	1	1	1				
	08A-0012-C1CS	08A-012-C1	12/4/2008 7:17	1.5	2.5							1				1		1		1			1	1	1	1	1		1		
	08A-0012-C1DS	08A-012-C1	12/4/2008 7:17	2.5	3.75				1		1	1						1	1	1	1		1	1	1	1	1				1
	08A-0012-C1ES	08A-012-C1	12/4/2008 7:17	3.86	5.5							1						1		1			1	1	1	1	1				
	08A-0012-C1FS	08A-012-C1	12/4/2008 7:17	5.5	7.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0012-C1GS	08A-012-C1	12/4/2008 7:17	7.5	9.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0012-C1HS	08A-012-C1	12/4/2008 7:17	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0012-C1IS	08A-012-C1	12/4/2008 7:17	11.5	13.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0012-C1JS	08A-012-C1	12/4/2008 7:17	13.5	14.33							1		1	1			1		1			1	1	1	1	1				1
	08A-0012-C2AS	08A-012-C2	12/4/2008 8:10	0	0.5				1		1			1	1	1					1								1		
	08A-0012-C2BS	08A-012-C2	12/4/2008 8:10	0.5	1.5				1		1			1	1	1			1		1								1		
	08A-0012-C2CS	08A-012-C2	12/4/2008 8:10	1.5	2.5				1		1			1	1						1										
	08A-0012-C2DS	08A-012-C2	12/4/2008 8:10	2.5	3.88									1	1	1													1		
	08A-0012-C2ES	08A-012-C2	12/4/2008 8:10	3.93	5.5				1		1			1	1	1					1								1		
	08A-0012-C2FS	08A-012-C2	12/4/2008 8:10	5.5	7.5									1	1	1													1		
	08A-0012-G1AS	08A-012-G1	12/4/2008 8:50	0	0.1			1																							

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0012-G1BS	08A-012-G1	12/4/2008 8:50	0.1	0.5								1																		
	08A-0012-G2AS	08A-012-G2	12/4/2008 8:57	0	0.5					1			1														1				1
013	08A-0013-C1AS	08A-013-C1	11/17/2008 7:36	0	0.5				1		1			1	1	1					1						1		1		
	08A-0013-C1BS	08A-013-C1	11/17/2008 7:36	0.5	1.5									1	1	1													1		
	08A-0013-C1CS	08A-013-C1	11/17/2008 7:36	1.5	2.5									1	1	1													1		
	08A-0013-C1DS	08A-013-C1	11/17/2008 7:36	2.5	3.5				1		1			1	1				1		1								1		
	08A-0013-C1GS	08A-013-C1	11/17/2008 7:36	7.5	9.5									1	1														1		
	08A-0013-C2AS	08A-013-C2	11/17/2008 8:25	0	0.5			1				1						1		1			1	1	1	1					
	08A-0013-C2BS	08A-013-C2	11/17/2008 8:25	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0013-C2CS	08A-013-C2	11/17/2008 8:25	1.5	2.5				1		1	1						1		1	1		1	1	1	1	1				
	08A-0013-C2DS	08A-013-C2	11/17/2008 8:25	2.5	3.5							1				1		1		1			1	1	1	1	1				1
	08A-0013-C2ES	08A-013-C2	11/17/2008 8:25	3.5	5.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0013-C2FS	08A-013-C2	11/17/2008 8:25	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0013-C2GS	08A-013-C2	11/17/2008 8:25	7.5	9.5				1		1	1				1		1	1	1	1		1	1	1	1	1				
	08A-0013-C2HS	08A-013-C2	11/17/2008 8:25	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0013-C2IS	08A-013-C2	11/17/2008 8:25	11.5	13.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0013-C2JS	08A-013-C2	11/17/2008 8:25	13.5	15.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0013-G1AS	08A-013-G1	11/17/2008 9:01	0	0.1			1																							
	08A-0013-G1BS	08A-013-G1	11/17/2008 9:01	0.1	0.5								1																		
	08A-0013-G2AS	08A-013-G2	11/17/2008 9:15	0	0.5					1																		1			1
014	08A-0014-C1AS	08A-0014-C1	12/3/2008 7:50	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0014-C1BS	08A-0014-C1	12/3/2008 7:50	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0014-C1CS	08A-0014-C1	12/3/2008 7:50	1.5	2.5							1						1		1			1	1	1	1	1				
	08A-0014-C1DS	08A-0014-C1	12/3/2008 7:50	2.5	3.5							1						1		1			1	1	1	1	1				1
	08A-0014-C1ES	08A-0014-C1	12/3/2008 7:50	3.5	5.5							1				1		1		1			1	1	1	1	1				
	08A-0014-C1FS	08A-0014-C1	12/3/2008 7:50	5.5	7.5							1		1	1			1		1			1	1	1	1	1				
	08A-0014-C1GS	08A-0014-C1	12/3/2008 7:50	7.5	9.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0014-C1HS	08A-0014-C1	12/3/2008 7:50	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0014-C1IS	08A-0014-C1	12/3/2008 7:50	11.5	13.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0014-C1JS	08A-0014-C1	12/3/2008 7:50	13.5	15.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0014-C1KS	08A-0014-C1	12/3/2008 7:50	15.5	17.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0014-C1LS	08A-0014-C1	12/3/2008 7:50	17.5	19.75				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0014-C1MS	08A-0014-C1	12/3/2008 7:50	19.75	21.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics	
	08A-0014-C1NS	08A-0014-C1	12/3/2008 7:50	21.5	23.18				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1	
	08A-0014-C2AS	08A-0014-C2	12/3/2008 9:40	0	0.5				1		1					1					1								1			
	08A-0014-C2BS	08A-0014-C2	12/3/2008 9:40	0.5	1.5				1		1			1	1				1		1								1			
	08A-0014-C2CS	08A-0014-C2	12/3/2008 9:40	1.5	2.5				1		1			1	1	1					1								1			
	08A-0014-C2DS	08A-0014-C2	12/3/2008 9:40	2.5	3.5				1		1			1	1	1			1		1								1			
	08A-0014-C2ES	08A-0014-C2	12/3/2008 9:40	3.5	5.5				1		1			1	1						1								1			
	08A-0014-C2FS	08A-0014-C2	12/3/2008 9:40	5.5	7.5				1		1					1					1								1			
	08A-0014-G1AS	08A-0014-G1	12/3/2008 10:10	0	0.1			1																								
	08A-0014-G1BS	08A-0014-G1	12/3/2008 10:10	0.1	0.5								1																			
	08A-0014-G2AS	08A-0014-G2	12/3/2008 10:20	0	0.5					1				1	1													1			1	
015	08A-0015-C1AS	08A-015-C1	11/12/2008 7:14	0	0.5				1		1			1	1						1								1			
	08A-0015-C1BS	08A-015-C1	11/12/2008 7:14	0.5	1.5				1		1			1	1						1											
	08A-0015-C1CS	08A-015-C1	11/12/2008 7:14	1.5	2.5									1	1	1													1			
	08A-0015-C1DS	08A-015-C1	11/12/2008 7:14	2.5	3.5									1	1	1											1		1			
	08A-0015-C2AS	08A-015-C2	11/12/2008 7:44	0	0.5			1				1				1		1		1			1	1	1	1	1					
	08A-0015-C2BS	08A-015-C2	11/12/2008 7:44	0.5	1.5							1				1		1		1			1	1	1	1	1		1			
	08A-0015-C2CS	08A-015-C2	11/12/2008 7:44	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1					
	08A-0015-C2DS	08A-015-C2	11/12/2008 7:44	2.5	3.5				1		1	1						1		1	1		1	1	1	1					1	
	08A-0015-C2ES	08A-015-C2	11/12/2008 7:44	3.5	5.5				1		1	1			1	1	1		1	1	1	1		1	1	1	1		1			
	08A-0015-C2FS	08A-015-C2	11/12/2008 7:44	5.5	7.5				1		1	1			1	1	1		1		1	1		1	1	1	1		1			
	08A-0015-C2GS	08A-015-C2	11/12/2008 7:44	7.5	8.35				1		1	1			1	1	1		1	1	1	1		1	1	1	1					
	08A-0015-C2HS	08A-015-C2	11/12/2008 7:44	8.35	10.5				1		1	1			1	1	1		1		1	1		1	1	1	1		1			
	08A-0015-C2IS	08A-015-C2	11/12/2008 7:44	10.5	11.85				1		1	1			1	1	1		1	1	1	1		1	1	1	1		1			
	08A-0015-C2JS	08A-015-C2	11/12/2008 7:44	11.85	13.15				1		1	1			1	1	1		1		1	1		1	1	1	1		1		1	
	08A-0015-G1AS	08A-015-G1	11/12/2008 7:58	0	0.1			1																								
	08A-0015-G1BS	08A-015-G1	11/12/2008 7:58	0.1	0.5									1																		
	08A-0015-G2AS	08A-015-G2	11/12/2008 8:07	0	0.5						1																		1			1
	016	08A-0016-C1AS	08A-0016-C1	12/1/2008 7:24	0	0.5			1				1				1		1		1			1	1	1	1	1				
08A-0016-C1BS		08A-0016-C1	12/1/2008 7:24	0.5	1.5							1				1		1		1			1	1	1	1	1					
08A-0016-C1CS		08A-0016-C1	12/1/2008 7:24	1.5	2.5							1				1		1		1			1	1	1	1	1					
08A-0016-C1DS		08A-0016-C1	12/1/2008 7:24	2.5	3.5							1				1		1		1			1	1	1	1	1				1	
08A-0016-C1ES		08A-0016-C1	12/1/2008 7:24	3.5	5.5							1						1		1			1	1	1	1	1					
08A-0016-C1FS		08A-0016-C1	12/1/2008 7:24	5.5	7.5				1		1	1						1	1	1	1		1	1	1	1	1					

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0016-C1GS	08A-0016-C1	12/1/2008 7:24	7.5	9.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0016-C1HS	08A-0016-C1	12/1/2008 7:24	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0016-C1IS	08A-0016-C1	12/1/2008 7:24	11.5	13.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0016-C1JS	08A-0016-C1	12/1/2008 7:24	13.5	15.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0016-C1KS	08A-0016-C1	12/1/2008 7:24	15.5	17.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0016-C1LS	08A-0016-C1	12/1/2008 7:24	17.5	19.12				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0016-C1MS	08A-0016-C1	12/1/2008 7:24	19.12	20.25						1				1					1	1				1		1		1		1
	08A-0016-C2AS	08A-0016-C2	12/1/2008 8:24	0	0.5				1		1			1	1						1								1		
	08A-0016-C2BS	08A-0016-C2	12/1/2008 8:24	0.5	1.5				1		1			1	1				1		1								1		
	08A-0016-C2CS	08A-0016-C2	12/1/2008 8:24	1.5	2.5				1		1			1	1						1								1		
	08A-0016-C2DS	08A-0016-C2	12/1/2008 8:24	2.5	3.5				1		1			1	1				1		1								1		
	08A-0016-C2ES	08A-0016-C2	12/1/2008 8:24	3.5	5.5				1		1			1	1	1			1		1								1		
	08A-0016-C2FS	08A-0016-C2	12/1/2008 8:24	5.5	7.5									1	1	1													1		
	08A-0016-G1AS	08A-0016-G1	12/1/2008 8:45	0	0.1			1																							
	08A-0016-G1BS	08A-0016-G1	12/1/2008 8:45	0.1	0.5								1																		
	08A-0016-G2AS	08A-0016-G2	12/1/2008 8:55	0	0.5					1																	1				1
017	08A-0017-C1AS	08A-017-C1	12/2/2008 7:26	0	0.5			1				1												1	1	1					
	08A-0017-C1BS	08A-017-C1	12/2/2008 7:26	0.5	1.5							1						1						1	1	1					
	08A-0017-C1CS	08A-017-C1	12/2/2008 7:26	1.5	2.5							1											1	1	1	1					
	08A-0017-C1DS	08A-017-C1	12/2/2008 7:26	2.5	3.5							1						1						1	1	1			1		1
	08A-0017-C1ES	08A-017-C1	12/2/2008 7:26	3.5	5.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0017-C1FS	08A-017-C1	12/2/2008 7:26	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0017-C1GS	08A-017-C1	12/2/2008 7:26	7.5	9.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0017-C1HS	08A-017-C1	12/2/2008 7:26	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0017-C1IS	08A-017-C1	12/2/2008 7:26	11.5	13.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0017-C1JS	08A-017-C1	12/2/2008 7:26	13.5	15.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0017-C1KS	08A-017-C1	12/2/2008 7:26	15.5	17.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0017-C1LS	08A-017-C1	12/2/2008 7:26	17.5	19.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0017-C1MS	08A-017-C1	12/2/2008 7:26	19.5	21.7				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0017-C1NS	08A-017-C1	12/2/2008 7:26	21.7	23.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0017-C1OS	08A-017-C1	12/2/2008 7:26	23.5	25				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		1
	08A-0017-C2AS	08A-017-C2	12/2/2008 9:29	0	0.5											1				1							1		1		
	08A-0017-C2BS	08A-017-C2	12/2/2008 9:29	0.5	1.5											1							1				1				

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0017-C2CS	08A-017-C2	12/2/2008 9:29	1.5	2.5									1	1	1													1		
	08A-0017-C2DS	08A-017-C2	12/2/2008 9:29	2.5	3.5											1						1					1				
	08A-0017-C3AS	08A-017-C3	12/2/2008 9:49	0	0.5				1		1							1			1		1								
	08A-0017-C3BS	08A-017-C3	12/2/2008 9:49	0.5	1.5				1		1			1	1				1	1	1								1		
	08A-0017-C3CS	08A-017-C3	12/2/2008 9:49	1.5	2.5				1		1							1		1	1						1				
	08A-0017-C3DS	08A-017-C3	12/2/2008 9:49	2.5	3.5				1		1			1	1				1	1	1										
	08A-0017-G1AS	08A-017-G1	12/2/2008 10:04	0	0.1			1																							
	08A-0017-G1BS	08A-017-G1	12/2/2008 10:04	0.1	0.5								1																		
	08A-0017-G2AS	08A-017-G2	12/2/2008 10:11	0	0.5					1				1	1													1			1
018	08A-0018-C1AS	08A-018-C1	11/10/2008 7:16	0	0.5			1				1				1				1			1	1	1	1	1		1		
	08A-0018-C1BS	08A-018-C1	11/10/2008 7:16	0.5	1.5							1				1				1			1	1	1	1	1		1		
	08A-0018-C1CS	08A-018-C1	11/10/2008 7:16	1.5	2.5				1		1	1							1		1		1	1	1	1	1				
	08A-0018-C1DS	08A-018-C1	11/10/2008 7:16	2.5	3.5						1					1				1			1	1	1	1	1				1
	08A-0018-C1ES	08A-018-C1	11/10/2008 7:16	3.5	5.5				1		1	1		1	1	1			1		1		1	1	1	1	1		1		
	08A-0018-C1FS	08A-018-C1	11/10/2008 7:16	5.5	7.5				1		1	1		1	1	1			1	1	1		1	1	1	1	1		1		
	08A-0018-C1GS	08A-018-C1	11/10/2008 7:16	7.5	9.5				1		1	1		1	1	1			1		1		1	1	1	1	1		1		
	08A-0018-C1HS	08A-018-C1	11/10/2008 7:16	9.5	11.5				1		1	1		1	1	1			1	1	1		1	1	1	1	1		1		
	08A-0018-C1IS	08A-018-C1	11/10/2008 7:16	11.5	13.5				1		1	1		1	1	1			1		1		1	1	1	1	1		1		1
	08A-0018-C2AS	08A-018-C2	11/10/2008 8:02	0	0.5				1		1			1	1						1										
	08A-0018-C2BS	08A-018-C2	11/10/2008 8:02	0.5	1.5				1		1			1	1				1		1										
	08A-0018-C2CS	08A-018-C2	11/10/2008 8:02	1.5	2.5									1	1	1													1		
	08A-0018-C2DS	08A-018-C2	11/10/2008 8:02	2.5	3.18				1		1			1	1				1		1								1		
	08A-0018-G1AS	08A-018-G1	11/10/2008 8:17	0	0.1			1																							
	08A-0018-G1BS	08A-018-G1	11/10/2008 8:17	0.1	0.5								1																		
	08A-0018-G2AS	08A-018-G2	11/10/2008 8:24	0	0.5					1																		1			1
019	08A-0019-C1AS	08A-019-C1	9/24/2008 8:20	0	0.5				1		1			1	1	1					1								1		
	08A-0019-C1BS	08A-019-C1	9/24/2008 8:20	0.5	1.5				1		1								1	1	1								1		
	08A-0019-C1CS	08A-019-C1	9/24/2008 8:20	1.5	2.5				1		1			1	1				1	1	1										
	08A-0019-C1DS	08A-019-C1	9/24/2008 8:20	2.5	3.5				1		1			1	1				1	1	1										
	08A-0019-C1ES	08A-019-C1	9/24/2008 8:20	3.5	5.27				1		1			1	1	1		1	1		1		1				1		1		1
	08A-0019-C2BS	08A-019-C2	9/24/2008 8:55	0.5	1.5									1	1	1						1					1				
	08A-0019-C2CS	08A-019-C2	9/24/2008 8:55	1.5	2.5											1						1					1				
	08A-0019-C2DS	08A-019-C2	9/24/2008 8:55	2.5	3.5											1						1					1				

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0019-C3AS	08A-019-C3	9/24/2008 9:29	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0019-C3BS	08A-019-C3	9/24/2008 9:29	0.5	1.5							1						1						1	1	1					
	08A-0019-C3CS	08A-019-C3	9/24/2008 9:29	1.5	2.5							1						1						1	1	1			1		
	08A-0019-C3DS	08A-019-C3	9/24/2008 9:29	2.5	3.5							1						1						1	1	1			1		1
	08A-0019-C3ES	08A-019-C3	9/24/2008 9:29	3.5	4							1								1				1	1	1					
019D	08A-0019-D1AS	08A-0019-D1	12/4/2008 10:30	0	0.07						1	1			1	1		1		1	1			1	1		1				
	08A-0019-D1BS	08A-0019-D1	12/4/2008 10:30	0.07	0.16						1	1			1	1		1		1	1			1	1		1				
	08A-0019-D1CS	08A-0019-D1	12/4/2008 10:30	0.16	0.33						1	1			1	1		1		1	1			1	1		1				
	08A-0019-D1DS	08A-0019-D1	12/4/2008 10:30	0.33	0.98						1	1			1	1		1		1	1			1	1		1				
	08A-0019-D1ES	08A-0019-D1	12/4/2008 10:30	0.98	1.97						1	1			1	1		1		1	1			1	1		1				
020	08A-0020-C2AS	08A-020-C2	11/4/2008 7:38	0	0.5			1				1								1			1	1	1	1					
	08A-0020-C2BS	08A-020-C2	11/4/2008 7:38	0.5	1.5							1						1		1			1	1	1	1					
	08A-0020-C2CS	08A-020-C2	11/4/2008 7:38	1.5	2.5				1		1	1						1	1	1	1			1	1	1					
	08A-0020-C2DS	08A-020-C2	11/4/2008 7:38	2.5	3.5						1							1						1	1	1			1		1
	08A-0020-C2ES	08A-020-C2	11/4/2008 7:38	3.5	5.5				1		1	1						1	1	1	1			1	1	1			1		
	08A-0020-C2FS	08A-020-C2	11/4/2008 7:38	5.5	7.5				1		1	1				1		1	1	1	1		1	1	1	1	1				
	08A-0020-C2GS	08A-020-C2	11/4/2008 7:38	7.5	9.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0020-C2HS	08A-020-C2	11/4/2008 7:38	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0020-C3AS	08A-020-C3	11/4/2008 8:15	0	0.5				1		1					1		1			1						1		1		
	08A-0020-C3BS	08A-020-C3	11/4/2008 8:15	0.5	1.5				1		1					1			1		1						1				
	08A-0020-C3CS	08A-020-C3	11/4/2008 8:15	1.5	2.5									1	1	1							1				1		1		
	08A-0020-C3DS	08A-020-C3	11/4/2008 8:15	2.5	3.5				1		1					1			1	1	1		1				1				
	08A-0020-C3ES	08A-020-C3	11/4/2008 8:15	3.5	5.5									1	1	1							1				1				
	08A-0020-C3FS	08A-020-C3	11/4/2008 8:15	5.5	7.5									1	1														1		
	08A-0020-C4AS	08A-020-C4	11/4/2008 8:42	0	0.5									1	1																
	08A-0020-C4BS	08A-020-C4	11/4/2008 8:42	0.5	1.5									1	1														1		
	08A-0020-C4DS	08A-020-C4	11/4/2008 8:42	2.5	3.5									1	1																
	08A-0020-G1AS	08A-020-G1	11/4/2008 8:57	0	0.1			1																							
	08A-0020-G1BS	08A-020-G1	11/4/2008 8:57	0.1	0.5								1																		
	08A-0020-G2AS	08A-020-G2	11/4/2008 9:04	0	0.5					1																		1			1
021	08A-0021-C1AS	08A-021-C1	11/6/2008 7:12	0	0.5			1				1						1		1			1	1	1	1					
	08A-0021-C1BS	08A-021-C1	11/6/2008 7:12	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1					
	08A-0021-C1CS	08A-021-C1	11/6/2008 7:12	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0021-C1DS	08A-021-C1	11/6/2008 7:12	2.5	3.5							1				1		1	1	1			1	1	1	1	1				1
	08A-0021-C1ES	08A-021-C1	11/6/2008 7:12	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0021-C1FS	08A-021-C1	11/6/2008 7:12	5.5	7.5				1		1	1				1		1	1	1	1		1	1	1	1	1				
	08A-0021-C1GS	08A-021-C1	11/6/2008 7:12	7.5	9.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0021-C1HS	08A-021-C1	11/6/2008 7:12	9.5	11.4				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0021-C2AS	08A-021-C2	11/6/2008 8:02	0	0.5		1		1		1			1	1	1					1						1		1		
	08A-0021-C2BS	08A-021-C2	11/6/2008 8:02	0.5	1.5									1	1	1											1		1		
	08A-0021-C2CS	08A-021-C2	11/6/2008 8:02	1.5	2.5									1	1	1													1		
	08A-0021-C2DS	08A-021-C2	11/6/2008 8:02	2.5	3.5				1		1			1	1				1		1								1		
	08A-0021-C2FS	08A-021-C2	11/6/2008 8:02	5.5	7.5									1	1														1		
	08A-0021-G3AS	08A-021-G3	11/6/2008 8:36	0	0.1			1																							
	08A-0021-G3BS	08A-021-G3	11/6/2008 8:36	0.1	0.5								1																		
	08A-0021-G4AS	08A-021-G4	11/6/2008 8:44	0	0.5	1											1					1								1	1
	08A-0021-G5AS	08A-021-G5	11/6/2008 9:00	0	0.5					1																	1				
022	08A-0022-C1AS	08A-022-C1	11/3/2008 10:18	0	0.5			1				1				1		1		1			1	1	1	1	1				
	08A-0022-C1BS	08A-022-C1	11/3/2008 10:18	0.5	1.5							1				1		1		1			1	1	1	1	1		1		
	08A-0022-C1CS	08A-022-C1	11/3/2008 10:18	1.5	2.5							1				1		1		1			1	1	1	1	1		1		
	08A-0022-C1DS	08A-022-C1	11/3/2008 10:18	2.5	3.5				1		1	1						1	1	1	1		1	1	1	1	1				1
	08A-0022-C1ES	08A-022-C1	11/3/2008 10:18	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0022-C1FS	08A-022-C1	11/3/2008 10:18	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0022-C1GS	08A-022-C1	11/3/2008 10:18	7.5	9.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0022-C1HS	08A-022-C1	11/3/2008 10:18	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0022-C1IS	08A-022-C1	11/3/2008 10:18	11.5	13				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0022-C1JS	08A-022-C1	11/3/2008 10:18	13	14.13				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0022-C2AS	08A-022-C2	11/3/2008 10:53	0	0.5				1		1			1	1						1								1		
	08A-0022-C2BS	08A-022-C2	11/3/2008 10:53	0.5	1.5				1		1			1	1				1		1										
	08A-0022-C2CS	08A-022-C2	11/3/2008 10:53	1.5	2.5				1		1			1	1				1		1										
	08A-0022-C2DS	08A-022-C2	11/3/2008 10:53	2.5	3.5									1	1	1													1		
	08A-0022-G1AS	08A-022-G1	11/3/2008 11:15	0	0.1			1																							
	08A-0022-G1BS	08A-022-G1	11/3/2008 11:15	0.1	0.5								1																		
	08A-0022-G2AS	08A-022-G2	11/3/2008 11:25	0	0.5					1																	1				1
022D	08A-0022-D2AS	08A-0022-D2	12/3/2008 13:00	0	0.07						1	1			1	1		1		1	1			1	1		1				
	08A-0022-D2BS	08A-0022-D2	12/3/2008 13:00	0.07	0.16						1	1			1	1		1		1	1			1	1		1				

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0022-D2CS	08A-0022-D2	12/3/2008 13:00	0.16	0.33						1	1			1	1		1		1	1			1	1		1				
	08A-0022-D2DS	08A-0022-D2	12/3/2008 13:00	0.33	0.98						1	1			1	1		1		1	1			1	1		1				
	08A-0022-D2ES	08A-0022-D2	12/3/2008 13:00	0.98	1.97						1	1			1	1		1		1	1			1	1		1				
023	08A-0023-C1AS	08A-023-C1	11/5/2008 9:23	0	0.5				1		1			1	1						1								1		
	08A-0023-C1BS	08A-023-C1	11/5/2008 9:23	0.5	1.5				1		1			1	1				1		1								1		
	08A-0023-C1CS	08A-023-C1	11/5/2008 9:23	1.5	2.5				1		1			1	1				1		1								1		
	08A-0023-C1DS	08A-023-C1	11/5/2008 9:23	2.5	3.5				1		1			1	1				1		1								1		
	08A-0023-C2AS	08A-023-C2	11/5/2008 10:26	0	0.5			1				1				1		1		1			1	1	1	1	1				
	08A-0023-C2BS	08A-023-C2	11/5/2008 10:26	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0023-C2CS	08A-023-C2	11/5/2008 10:26	1.5	2.5							1				1		1		1			1	1	1	1	1				
	08A-0023-C2DS	08A-023-C2	11/5/2008 10:26	2.5	3.5							1				1		1		1			1	1	1	1	1				1
	08A-0023-C2ES	08A-023-C2	11/5/2008 10:26	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1			1	
	08A-0023-C2FS	08A-023-C2	11/5/2008 10:26	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1			1	
	08A-0023-C2GS	08A-023-C2	11/5/2008 10:26	7.5	9.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1			1	
	08A-0023-C2HS	08A-023-C2	11/5/2008 10:26	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1			1	
	08A-0023-C2IS	08A-023-C2	11/5/2008 10:26	11.5	13.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1			1	
	08A-0023-C2JS	08A-023-C2	11/5/2008 10:26	13.5	15.25				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1			1	1
	08A-0023-G1AS	08A-023-G1	11/5/2008 11:12	0	0.1			1																							
	08A-0023-G1BS	08A-023-G1	11/5/2008 11:12	0.1	0.5								1																		
	08A-0023-G2AS	08A-023-G2	11/5/2008 11:20	0	0.5					1																		1			1
024	08A-0024-C1AS	08A-024-C1	10/30/2008 8:26	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0024-C1BS	08A-024-C1	10/30/2008 8:26	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0024-C1CS	08A-024-C1	10/30/2008 8:26	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0024-C1DS	08A-024-C1	10/30/2008 8:26	2.5	3.5							1				1		1		1			1	1	1	1	1				1
	08A-0024-C1ES	08A-024-C1	10/30/2008 8:26	3.5	5.5							1				1		1		1			1	1	1	1	1			1	
	08A-0024-C1FS	08A-024-C1	10/30/2008 8:26	5.5	7.5							1				1		1		1			1	1	1	1	1			1	
	08A-0024-C1GS	08A-024-C1	10/30/2008 8:26	7.5	9.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1			1	
	08A-0024-C1HS	08A-024-C1	10/30/2008 8:26	9.5	10.65							1		1	1	1		1		1			1	1	1	1	1			1	1
	08A-0024-C2AS	08A-024-C2	10/30/2008 9:09	0	0.5				1		1			1	1	1					1									1	
	08A-0024-C2BS	08A-024-C2	10/30/2008 9:09	0.5	1.5				1		1			1	1				1		1									1	
	08A-0024-C2CS	08A-024-C2	10/30/2008 9:09	1.5	2.5									1	1	1														1	
	08A-0024-C2DS	08A-024-C2	10/30/2008 9:09	2.5	3.5				1		1			1	1				1		1									1	
	08A-0024-C2ES	08A-024-C2	10/30/2008 9:09	3.5	5.5				1		1			1	1				1		1										

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0024-C2FS	08A-024-C2	10/30/2008 9:09	5.5	7.28				1		1			1	1				1		1										
	08A-0024-G2AS	08A-024-G2	10/30/2008 9:48	0	0.1			1			1			1							1										
	08A-0024-G2BS	08A-024-G2	10/30/2008 9:48	0.1	0.5								1																		
	08A-0024-G3AS	08A-024-G3	10/30/2008 9:58	0	0.5					1																	1				1
025	08A-0025-C1AS	08A-025-C1	11/3/2008 8:09	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0025-C1BS	08A-025-C1	11/3/2008 8:09	0.5	1.5							1						1		1			1	1	1	1	1				
	08A-0025-C1CS	08A-025-C1	11/3/2008 8:09	1.5	2.5							1				1		1		1			1	1	1	1	1				
	08A-0025-C1DS	08A-025-C1	11/3/2008 8:09	2.5	3.5				1		1	1						1	1	1	1		1	1	1	1	1				1
	08A-0025-C1ES	08A-025-C1	11/3/2008 8:09	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0025-C1FS	08A-025-C1	11/3/2008 8:09	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0025-C1GS	08A-025-C1	11/3/2008 8:09	7.5	8.7				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0025-C3AS	08A-025-C3	11/3/2008 9:11	0	0.5				1		1			1	1	1					1								1		
	08A-0025-C3BS	08A-025-C3	11/3/2008 9:11	0.5	1.5				1		1			1	1	1			1		1								1		
	08A-0025-C3CS	08A-025-C3	11/3/2008 9:11	1.5	2.5				1		1			1	1				1		1								1		
	08A-0025-C3DS	08A-025-C3	11/3/2008 9:11	2.5	3.5									1	1	1													1		
	08A-0025-G1AS	08A-025-G1	11/3/2008 9:25	0	0.1			1																							
	08A-0025-G1BS	08A-025-G1	11/3/2008 9:25	0.1	0.5								1																		
	08A-0025-G2AS	08A-025-G2	11/3/2008 9:35	0	0.5					1																	1				1
026	08A-0026-C1AS	08A-026-C1	10/28/2008 8:29	0	0.5			1				1				1		1		1			1	1	1	1	1				
	08A-0026-C1BS	08A-026-C1	10/28/2008 8:29	0.5	1.5							1				1		1		1			1	1	1	1	1		1		
	08A-0026-C1CS	08A-026-C1	10/28/2008 8:29	1.5	2.6							1						1		1			1	1	1	1	1				
	08A-0026-C1DS	08A-026-C1	10/28/2008 8:29	2.6	3.6				1		1	1				1		1	1	1	1		1	1	1	1	1				1
	08A-0026-C1ES	08A-026-C1	10/28/2008 8:29	3.6	5.98				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0026-C2AS	08A-026-C2	10/28/2008 9:07	0	0.5				1		1			1	1						1								1		
	08A-0026-C2BS	08A-026-C2	10/28/2008 9:07	0.5	1.5				1		1			1	1				1		1										
	08A-0026-C2CS	08A-026-C2	10/28/2008 9:07	1.5	2.4				1		1			1	1	1			1		1								1		
	08A-0026-C2DS	08A-026-C2	10/28/2008 9:07	2.4	3.5									1	1														1		
	08A-0026-G1AS	08A-026-G1	10/29/2008 12:36	0	0.1			1																							
	08A-0026-G1BS	08A-026-G1	10/29/2008 12:36	0.1	0.5								1																		
	08A-0026-G2AS	08A-026-G2	10/29/2008 12:45	0	0.5	1											1					1								1	1
	08A-0026-G3AS	08A-026-G3	10/29/2008 12:55	0	0.5					1																	1				
027	08A-0027-C1AS	08A-027-C1	10/29/2008 10:50	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0027-C1BS	08A-027-C1	10/29/2008 10:50	0.5	1.5							1				1		1		1			1	1	1	1	1		1		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0027-C1CS	08A-027-C1	10/29/2008 10:50	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0027-C1DS	08A-027-C1	10/29/2008 10:50	2.5	3.5							1						1		1			1	1	1	1	1				1
	08A-0027-C1ES	08A-027-C1	10/29/2008 10:50	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0027-C1FS	08A-027-C1	10/29/2008 10:50	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0027-C1GS	08A-027-C1	10/29/2008 10:50	7.5	9.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0027-C1HS	08A-027-C1	10/29/2008 10:50	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0027-C1IS	08A-027-C1	10/29/2008 10:50	11.5	13.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0027-C2AS	08A-027-C2	10/29/2008 11:36	0	0.5				1		1			1	1	1					1								1		
	08A-0027-C2BS	08A-027-C2	10/29/2008 11:36	0.5	1.5				1		1			1	1				1		1										
	08A-0027-C2CS	08A-027-C2	10/29/2008 11:36	1.5	2.5									1	1	1													1		
	08A-0027-C2DS	08A-027-C2	10/29/2008 11:36	2.5	3.5				1		1			1	1	1			1		1								1		
	08A-0027-G1AS	08A-027-G1	10/29/2008 11:57	0	0.1			1																							
	08A-0027-G1BS	08A-027-G1	10/29/2008 11:57	0.1	0.5								1																		
	08A-0027-G2AS	08A-027-G2	10/29/2008 12:10	0	0.5					1																		1			1
028	08A-0028-C1AS	08A-028-C1	11/5/2008 7:30	0	0.5				1		1			1	1	1					1						1		1		
	08A-0028-C1BS	08A-028-C1	11/5/2008 7:30	0.5	1.5									1	1	1											1		1		
	08A-0028-C1CS	08A-028-C1	11/5/2008 7:30	1.5	2.5									1	1	1													1		
	08A-0028-C1DS	08A-028-C1	11/5/2008 7:30	2.5	3.44				1		1			1	1				1		1										
	08A-0028-C2AS	08A-028-C2	11/5/2008 8:10	0	0.5			1				1						1		1			1	1	1	1					
	08A-0028-C2BS	08A-028-C2	11/5/2008 8:10	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1					
	08A-0028-C2CS	08A-028-C2	11/5/2008 8:10	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0028-C2DS	08A-028-C2	11/5/2008 8:10	2.5	3.5							1				1		1		1			1	1	1	1	1		1		1
	08A-0028-C2ES	08A-028-C2	11/5/2008 8:10	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0028-C2FS	08A-028-C2	11/5/2008 8:10	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0028-C2GS	08A-028-C2	11/5/2008 8:10	7.5	9.1				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0028-G1AS	08A-028-G1	11/5/2008 8:36	0	0.1			1																							
	08A-0028-G1BS	08A-028-G1	11/5/2008 8:36	0.1	0.5								1																		
	08A-0028-G2AS	08A-028-G2	11/5/2008 8:44	0	0.5					1																		1			1
028D	08A-0028-D1AS	08A-0028-D1	12/8/2008 12:13	0	0.07						1	1			1	1		1		1	1			1	1		1				
	08A-0028-D1BS	08A-0028-D1	12/8/2008 12:13	0.07	0.16						1	1			1	1		1		1	1			1	1		1				
	08A-0028-D1CS	08A-0028-D1	12/8/2008 12:13	0.16	0.33						1	1			1	1		1		1	1			1	1		1				
	08A-0028-D1DS	08A-0028-D1	12/8/2008 12:13	0.33	0.98						1	1			1	1		1		1	1			1	1		1				
	08A-0028-D1ES	08A-0028-D1	12/8/2008 12:13	0.98	1.97						1	1			1	1		1		1	1			1	1		1				

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
029	08A-0029-C1AS	08A-029-C1	10/29/2008 8:30	0	0.5			1				1												1	1	1					
	08A-0029-C1BS	08A-029-C1	10/29/2008 8:30	0.5	1.5							1								1				1	1	1					
	08A-0029-C1CS	08A-029-C1	10/29/2008 8:30	1.5	2.5							1								1				1	1	1					
	08A-0029-C1DS	08A-029-C1	10/29/2008 8:30	2.5	3.5							1											1	1	1	1					1
	08A-0029-C1ES	08A-029-C1	10/29/2008 8:30	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0029-C1FS	08A-029-C1	10/29/2008 8:30	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0029-C1GS	08A-029-C1	10/29/2008 8:30	7.5	8.75				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0029-C2AS	08A-029-C2	10/29/2008 9:09	0	0.5											1		1		1			1				1				
	08A-0029-C2BS	08A-029-C2	10/29/2008 9:09	0.5	1.5													1					1				1				
	08A-0029-C2CS	08A-029-C2	10/29/2008 9:09	1.5	2.5											1		1					1				1		1		
	08A-0029-C2DS	08A-029-C2	10/29/2008 9:09	2.5	3.5				1		1					1		1	1		1						1		1		
	08A-0029-C3AS	08A-029-C3	10/29/2008 9:30	0	0.5				1		1										1								1		
	08A-0029-C3BS	08A-029-C3	10/29/2008 9:30	0.5	1.5				1		1			1	1	1			1		1								1		
	08A-0029-C3CS	08A-029-C3	10/29/2008 9:30	1.5	2.5				1		1			1	1				1		1										
	08A-0029-C3DS	08A-029-C3	10/29/2008 9:30	2.5	3.5									1	1					1											
	08A-0029-G1AS	08A-029-G1	10/29/2008 9:50	0	0.1			1																							
	08A-0029-G1BS	08A-029-G1	10/29/2008 9:50	0.1	0.5								1																		
	08A-0029-G2AS	08A-029-G2	10/29/2008 10:05	0	0.5					1				1	1													1			1
030	08A-0030-C1AS	08A-030-C1	10/27/2008 8:57	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0030-C1BS	08A-030-C1	10/27/2008 8:57	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0030-C1CS	08A-030-C1	10/27/2008 8:57	1.5	2.5							1						1		1			1	1	1	1	1				
	08A-0030-C1DS	08A-030-C1	10/27/2008 8:57	2.5	3.5							1						1		1			1	1	1	1	1				1
	08A-0030-C1ES	08A-030-C1	10/27/2008 8:57	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0030-C1FS	08A-030-C1	10/27/2008 8:57	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0030-C1GS	08A-030-C1	10/27/2008 8:57	7.5	8.73				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1				1
	08A-0030-C2AS	08A-030-C2	10/27/2008 9:44	0	0.5				1		1			1	1	1					1								1		
	08A-0030-C2BS	08A-030-C2	10/27/2008 9:44	0.5	1.5				1		1			1	1				1		1								1		
	08A-0030-C2CS	08A-030-C2	10/27/2008 9:44	1.5	2.5				1		1			1	1	1			1		1								1		
	08A-0030-C2DS	08A-030-C2	10/27/2008 9:44	2.5	3.5				1		1			1	1	1			1		1								1		
	08A-0030-G1AS	08A-030-G1	10/27/2008 10:00	0	0.1			1																							
	08A-0030-G1BS	08A-030-G1	10/27/2008 10:00	0.1	0.5								1																		
	08A-0030-G2AS	08A-030-G2	10/27/2008 10:12	0	0.5					1																		1			1
031	08A-0031-C1AS	08A-031-C1	10/23/2008 8:33	0	0.5			1				1						1		1			1	1	1	1					

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0031-C1BS	08A-031-C1	10/23/2008 8:33	0.5	1.5							1				1		1	1				1	1	1	1	1				
	08A-0031-C1CS	08A-031-C1	10/23/2008 8:33	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0031-C1DS	08A-031-C1	10/23/2008 8:33	2.5	3.5							1				1		1		1			1	1	1	1	1		1		1
	08A-0031-C1ES	08A-031-C1	10/23/2008 8:33	3.5	5.5							1		1	1			1		1			1	1	1	1	1				
	08A-0031-C1FS	08A-031-C1	10/23/2008 8:33	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1				1
	08A-0031-C2AS	08A-031-C2	10/23/2008 9:43	0	0.5				1		1			1	1	1					1						1		1		
	08A-0031-C2BS	08A-031-C2	10/23/2008 9:43	0.5	1.5				1		1			1	1				1		1								1		
	08A-0031-C2CS	08A-031-C2	10/23/2008 9:43	1.5	2.5									1	1	1					1								1		
	08A-0031-C2DS	08A-031-C2	10/23/2008 9:43	2.5	3.5				1		1			1	1				1		1								1		
	08A-0031-C2ES	08A-031-C2	10/23/2008 9:43	3.5	5.5				1		1					1			1		1								1		
	08A-0031-C2FS	08A-031-C2	10/23/2008 9:43	5.5	7.5																							1			
032	08A-0032-C1AS	08A-032-C1	10/23/2008 10:48	0	0.5				1		1			1	1						1								1		
	08A-0032-C1BS	08A-032-C1	10/23/2008 10:48	0.5	1.5									1	1	1													1		
	08A-0032-C1CS	08A-032-C1	10/23/2008 10:48	1.5	2.5				1		1			1	1				1		1										
	08A-0032-C1DS	08A-032-C1	10/23/2008 10:48	2.5	3.5									1	1	1													1		
	08A-0032-C2AS	08A-032-C2	10/23/2008 11:22	0	0.5			1				1				1			1				1	1	1	1	1				
	08A-0032-C2BS	08A-032-C2	10/23/2008 11:22	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0032-C2CS	08A-032-C2	10/23/2008 11:22	1.5	2.5							1				1			1				1	1	1	1	1		1		
	08A-0032-C2DS	08A-032-C2	10/23/2008 11:22	2.5	3.5				1		1	1						1	1	1	1		1	1	1	1	1				1
	08A-0032-C2ES	08A-032-C2	10/23/2008 11:22	3.5	5.5				1		1	1		1	1	1			1	1	1		1	1	1	1	1		1		
	08A-0032-C2FS	08A-032-C2	10/23/2008 11:22	5.5	7.5				1		1	1			1	1			1	1	1		1	1	1	1	1		1		
	08A-0032-C2GS	08A-032-C2	10/23/2008 11:22	7.5	9.5				1		1	1			1	1			1	1	1		1	1	1	1	1		1		
	08A-0032-C2HS	08A-032-C2	10/23/2008 11:22	9.5	10.9				1		1	1			1	1			1	1	1		1	1	1	1	1		1		
	08A-0032-C2IS	08A-032-C2	10/23/2008 11:22	10.9	12.10				1		1	1			1	1			1	1	1		1	1	1	1	1		1		1
	08A-0032-G1AS	08A-032-G1	10/23/2008 12:02	0	0.1			1																							
	08A-0032-G1BS	08A-032-G1	10/23/2008 12:02	0.1	0.5								1																		
	08A-0032-G2AS	08A-032-G2	10/23/2008 12:12	0	0.5					1																	1				1
033	08A-0033-C1AS	08A-033-C1	10/22/2008 10:46	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0033-C1BS	08A-033-C1	10/22/2008 10:46	0.5	1.5							1						1		1			1	1	1	1	1				
	08A-0033-C1CS	08A-033-C1	10/22/2008 10:46	1.5	2.5							1				1		1		1			1	1	1	1	1				
	08A-0033-C1DS	08A-033-C1	10/22/2008 10:46	2.5	3.5							1						1		1			1	1	1	1	1		1		1
	08A-0033-C1ES	08A-033-C1	10/22/2008 10:46	3.5	5.8							1						1		1			1	1	1	1					
	08A-0033-C1FS	08A-033-C1	10/22/2008 10:46	5.8	7.5						1				1					1	1				1		1		1		1

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0033-C2AS	08A-033-C2	10/22/2008 11:25	0	0.5				1		1			1	1	1					1								1		
	08A-0033-C2BS	08A-033-C2	10/22/2008 11:25	0.5	1.5				1		1			1	1	1			1		1								1		
	08A-0033-C2CS	08A-033-C2	10/22/2008 11:25	1.5	2.5				1		1			1	1				1		1								1		
	08A-0033-C2DS	08A-033-C2	10/22/2008 11:25	2.5	3.5				1		1			1	1	1			1		1										
	08A-0033-G1AS	08A-033-G1	10/22/2008 11:58	0	0.1			1																							
	08A-0033-G1BS	08A-033-G1	10/22/2008 11:58	0.1	0.5								1																		
	08A-0033-G2AS	08A-033-G2	10/22/2008 12:10	0	0.5					1																		1			1
034	08A-0034-C1AS	08A-034-C1	10/22/2008 8:11	0	0.5			1				1				1		1		1			1	1	1	1	1				
	08A-0034-C1BS	08A-034-C1	10/22/2008 8:11	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0034-C1CS	08A-034-C1	10/22/2008 8:11	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				1
	08A-0034-C3AS	08A-034-C3	10/22/2008 8:53	0	0.5		1		1		1			1	1						1								1		
	08A-0034-C3BS	08A-034-C3	10/22/2008 8:53	0.5	1.5				1		1			1	1				1	1	1								1		
	08A-0034-C3CS	08A-034-C3	10/22/2008 8:53	1.5	2.32									1	1	1													1		
	08A-0034-G1AS	08A-034-G1	10/22/2008 9:20	0	0.1			1																							
	08A-0034-G1BS	08A-034-G1	10/22/2008 9:20	0.1	0.5								1																		
	08A-0034-G2AS	08A-034-G2	10/22/2008 9:37	0	0.5	1											1					1							1		1
	08A-0034-G3AS	08A-034-G3	10/22/2008 9:58	0	0.5					1																		1			
034D	08A-0034-D2AS	08A-0034-D2	12/8/2008 15:04	0	0.07						1	1			1	1		1		1	1			1	1		1				
	08A-0034-D2BS	08A-0034-D2	12/8/2008 15:04	0.07	0.16						1	1			1	1		1		1	1			1	1		1				
	08A-0034-D2CS	08A-0034-D2	12/8/2008 15:04	0.16	0.33						1	1			1	1		1		1	1			1	1		1				
	08A-0034-D2DS	08A-0034-D2	12/8/2008 15:04	0.33	0.98						1	1			1	1		1		1	1			1	1		1				1
	08A-0034-D2ES	08A-0034-D2	12/8/2008 15:04	0.98	1.97						1	1			1	1		1		1	1			1	1		1				
035	08A-0035-C5AS	08A-035-C5	9/23/2008 10:30	0	0.5			1				1				1		1		1			1	1	1	1	1				
	08A-0035-C5BS	08A-035-C5	9/23/2008 10:30	0.5	1.5						1				1					1	1				1	1		1			1
	08A-0035-C6AS	08A-035-C6	9/23/2008 11:15	0	0.5				1		1			1	1						1								1		
036	08A-0036-C1AS	08A-036-C1	10/21/2008 11:55	0	0.5				1		1			1	1	1					1								1		
	08A-0036-C1BS	08A-036-C1	10/21/2008 11:55	0.5	1.5				1		1			1	1				1		1								1		
	08A-0036-C1CS	08A-036-C1	10/21/2008 11:55	1.5	2.5				1		1			1	1				1		1										
	08A-0036-C1DS	08A-036-C1	10/21/2008 11:55	2.5	3.5									1	1	1													1		
	08A-0036-C1ES	08A-036-C1	10/21/2008 11:55	3.5	5.5				1		1			1	1				1		1								1		
	08A-0036-C2AS	08A-036-C2	10/21/2008 12:46	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0036-C2BS	08A-036-C2	10/21/2008 12:46	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0036-C2CS	08A-036-C2	10/21/2008 12:46	1.5	2.5							1				1		1		1			1	1	1	1	1		1		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0036-C2DS	08A-036-C2	10/21/2008 12:46	2.5	3.5				1		1	1						1	1	1	1		1	1	1	1	1				1
	08A-0036-C2ES	08A-036-C2	10/21/2008 12:46	3.5	5.5							1				1		1		1			1	1	1	1	1				
	08A-0036-C2FS	08A-036-C2	10/21/2008 12:46	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0036-C2GS	08A-036-C2	10/21/2008 12:46	7.5	7.97							1						1		1			1	1	1	1					1
	08A-0036-G1AS	08A-036-G1	10/21/2008 13:15	0	0.1			1																							
	08A-0036-G1BS	08A-036-G1	10/21/2008 13:15	0.1	0.5								1																		
	08A-0036-G2AS	08A-036-G2	10/21/2008 13:33	0	0.5					1																	1				1
037	08A-0037-C1AS	08A-037-C1	10/20/2008 12:00	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0037-C1BS	08A-037-C1	10/20/2008 12:00	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0037-C1CS	08A-037-C1	10/20/2008 12:00	1.5	2.5							1						1		1			1	1	1	1					
	08A-0037-C1DS	08A-037-C1	10/20/2008 12:00	2.5	3.5							1				1		1		1			1	1	1	1	1				1
	08A-0037-C1ES	08A-037-C1	10/20/2008 12:00	3.5	4.91				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0037-C2AS	08A-037-C2	10/20/2008 12:47	0	0.5				1		1			1	1	1					1								1		
	08A-0037-C2BS	08A-037-C2	10/20/2008 12:47	0.5	1.5				1		1			1	1				1		1								1		
	08A-0037-C2CS	08A-037-C2	10/20/2008 12:47	1.5	2.5				1		1			1	1	1			1		1						1		1		
	08A-0037-C2DS	08A-037-C2	10/20/2008 12:47	2.5	2.76				1		1			1	1				1		1										
	08A-0037-G1AS	08A-037-G1	10/20/2008 13:17	0	0.1			1																							
	08A-0037-G1BS	08A-037-G1	10/20/2008 13:17	0.1	0.5								1																		
	08A-0037-G2AS	08A-037-G2	10/20/2008 13:33	0	0.5					1																		1			1
038	08A-0038-C1AS	08A-038-C1	10/21/2008 9:10	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0038-C1BS	08A-038-C1	10/21/2008 9:10	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0038-C1CS	08A-038-C1	10/21/2008 9:10	1.5	2.5							1				1		1		1			1	1	1	1	1				
	08A-0038-C1DS	08A-038-C1	10/21/2008 9:10	2.5	3.5							1						1		1			1	1	1	1	1				1
	08A-0038-C1ES	08A-038-C1	10/21/2008 9:10	3.5	5.5				1		1	1						1	1	1	1			1	1	1					
	08A-0038-C2AS	08A-038-C2	10/21/2008 10:05	0	0.5				1		1			1	1	1					1								1		
	08A-0038-C2BS	08A-038-C2	10/21/2008 10:05	0.5	1.5									1	1	1													1		
	08A-0038-C2CS	08A-038-C2	10/21/2008 10:05	1.5	2.5				1		1			1	1				1		1								1		
	08A-0038-C2DS	08A-038-C2	10/21/2008 10:05	2.5	3.5				1		1			1	1	1			1		1								1		
	08A-0038-C2ES	08A-038-C2	10/21/2008 10:05	3.5	5.5									1	1	1							1				1		1		
	08A-0038-C2FS	08A-038-C2	10/21/2008 10:05	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0038-C2GS	08A-038-C2	10/21/2008 10:05	7.5	8.40				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0038-G1AS	08A-038-G1	10/21/2008 10:35	0	0.1			1																							
	08A-0038-G1BS	08A-038-G1	10/21/2008 10:35	0.1	0.5								1																		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0038-G2AS	08A-038-G2	10/21/2008 10:50	0	0.5					1																	1				1
039	08A-0039-C1AS	08A-039-C1	10/20/2008 14:35	0	0.5			1		1		1						1		1			1	1	1	1	1				
	08A-0039-C1BS	08A-039-C1	10/20/2008 14:35	0.5	1.5							1						1		1			1	1	1	1	1				
	08A-0039-C1CS	08A-039-C1	10/20/2008 14:35	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0039-C1DS	08A-039-C1	10/20/2008 14:35	2.5	3.5							1				1		1		1			1	1	1	1	1		1		1
	08A-0039-C1ES	08A-039-C1	10/20/2008 14:35	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0039-C1FS	08A-039-C1	10/20/2008 14:35	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0039-C1GS	08A-039-C1	10/20/2008 14:35	7.5	9.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0039-C1HS	08A-039-C1	10/20/2008 14:35	9.5	10.4				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0039-C2AS	08A-039-C2	10/20/2008 15:19	0	0.5				1		1			1	1	1					1								1		
	08A-0039-C2BS	08A-039-C2	10/20/2008 15:19	0.5	1.5				1		1			1	1	1			1		1								1		
	08A-0039-C2CS	08A-039-C2	10/20/2008 15:19	1.5	2.5									1	1	1													1		
	08A-0039-C2DS	08A-039-C2	10/20/2008 15:19	2.5	3.5				1		1			1	1				1		1										
	08A-0039-G1AS	08A-039-G1	10/20/2008 15:40	0	0.1			1																							
	08A-0039-G1BS	08A-039-G1	10/20/2008 15:40	0.1	0.5								1																		
	08A-0039-G2AS	08A-039-G2	10/20/2008 15:50	0	0.5					1																		1			1
040	08A-0040-C1AS	08A-040-C1	9/24/2008 12:22	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0040-C1BS	08A-040-C1	9/24/2008 12:22	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0040-C1CS	08A-040-C1	9/24/2008 12:22	1.5	2.5							1						1		1			1	1	1	1					
	08A-0040-C1DS	08A-040-C1	9/24/2008 12:22	2.5	3.5							1						1		1			1	1	1	1	1				1
	08A-0040-C1ES	08A-040-C1	9/24/2008 12:22	3.5	5.3				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0040-C3AS	08A-040-C3	9/24/2008 13:20	0	0.5				1		1			1	1	1					1								1		
	08A-0040-C3BS	08A-040-C3	9/24/2008 13:20	0.5	1.5				1		1			1	1				1		1								1		
	08A-0040-C3CS	08A-040-C3	9/24/2008 13:20	1.5	2.3				1		1			1	1	1			1		1						1		1		
	08A-0040-G2AS	08A-040-G2	9/24/2008 14:10	0	0.1			1					1																		
041	08A-0041-C1AS	08A-041-C1	9/22/2008 8:52	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0041-C1BS	08A-041-C1	9/22/2008 8:52	0.5	1.5							1						1		1			1	1	1	1	1				
	08A-0041-C1CS	08A-041-C1	9/22/2008 8:52	1.5	2.5							1				1		1		1			1	1	1	1	1				
	08A-0041-C1DS	08A-041-C1	9/22/2008 8:52	2.5	3.5							1								1			1	1	1	1					1
	08A-0041-C1ES	08A-041-C1	9/22/2008 8:52	3.5	4.68				1		1	1				1		1	1	1	1		1	1	1	1	1				1
	08A-0041-C2AS	08A-041-C2	9/22/2008 9:29	0	0.5				1		1			1	1	1					1								1		
	08A-0041-C2BS	08A-041-C2	9/22/2008 9:29	0.5	1.5				1		1			1	1	1			1		1								1		
	08A-0041-C2CS	08A-041-C2	9/22/2008 9:29	1.5	2.5				1		1			1	1				1		1								1		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0041-C2DS	08A-041-C2	9/22/2008 9:29	2.5	3.5				1		1			1	1	1		1	1		1						1		1		
	08A-0041-C2ES	08A-041-C2	9/22/2008 9:29	3.5	3.8									1	1														1		
	08A-0041-G2AS	08A-041-G2	9/22/2008 10:05	0	0.1			1					1																		
	08A-0041-G3AS	08A-041-G3	9/22/2008 10:18	0	0.5					1																		1			1
042	08A-0042-C1AS	08A-042-C1	9/22/2008 10:48	0	0.5				1		1			1	1	1					1									1	
	08A-0042-C1BS	08A-042-C1	9/22/2008 10:48	0.5	1.5				1		1			1	1	1			1		1									1	
	08A-0042-C1CS	08A-042-C1	9/22/2008 10:48	1.5	2.5				1		1			1	1				1		1									1	
	08A-0042-C1DS	08A-042-C1	9/22/2008 10:48	2.5	3.5				1		1			1	1				1		1									1	
	08A-0042-C2AS	08A-042-C2	9/22/2008 11:25	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0042-C2BS	08A-042-C2	9/22/2008 11:25	0.5	1.5							1						1		1			1	1	1	1	1				
	08A-0042-C2CS	08A-042-C2	9/22/2008 11:25	1.5	2.5							1				1		1		1			1	1	1	1	1				
	08A-0042-C2DS	08A-042-C2	9/22/2008 11:25	2.5	3.5							1				1		1		1			1	1	1	1	1				1
	08A-0042-C2ES	08A-042-C2	9/22/2008 11:25	3.5	5.35				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1			1	
	08A-0042-G1AS	08A-042-G1	9/22/2008 12:08	0	0.1			1					1																		
	08A-0042-G2AS	08A-042-G2	9/22/2008 12:19	0	0.5					1																		1			1
043	08A-0043-C2AS	08A-043-C2	8/19/2008 8:16	0	0.5			1				1						1		1			1	1	1	1					
	08A-0043-C2BS	08A-043-C2	8/19/2008 8:16	0.5	1.5							1						1						1	1	1				1	
	08A-0043-C2CS	08A-043-C2	8/19/2008 8:16	1.5	2.5							1						1						1	1	1				1	
	08A-0043-C2DS	08A-043-C2	8/19/2008 8:16	2.5	3							1								1						1					1
	08A-0043-C2ES	08A-043-C2	8/19/2008 8:16	3	5.5						1				1					1	1				1		1			1	
	08A-0043-C4AS	08A-043-C4	8/19/2008 9:23	0	0.5				1		1					1					1						1			1	
	08A-0043-C4BS	08A-043-C4	8/19/2008 9:23	0.5	1.5									1	1	1							1				1				
	08A-0043-C4CS	08A-043-C4	8/19/2008 9:23	1.5	2.5									1	1	1							1				1				
	08A-0043-C4DS	08A-043-C4	8/19/2008 9:23	2.5	3.5				1		1			1	1	1		1	1		1		1	1	1		1			1	
	08A-0043-C5AS	08A-043-C5	8/19/2008 10:07	0	0.5									1	1																
	08A-0043-C5BS	08A-043-C5	8/19/2008 10:07	0.5	1.5				1		1								1	1	1										
	08A-0043-C5CS	08A-043-C5	8/19/2008 10:07	1.5	2.5				1		1								1	1	1										
	08A-0043-G8AS	08A-043-G8	8/19/2008 11:30	0	0.1			1																							
044	08A-0044-C1AS	08A-044-C1	8/19/2008 12:23	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0044-C1BS	08A-044-C1	8/19/2008 12:23	0.5	1.5							1						1		1			1	1	1	1					
	08A-0044-C1CS	08A-044-C1	8/19/2008 12:23	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0044-C1DS	08A-044-C1	8/19/2008 12:23	2.5	3.5				1		1	1				1		1	1	1	1		1	1	1	1	1				1
	08A-0044-C1ES	08A-044-C1	8/19/2008 12:23	3.5	5.7							1				1		1		1			1	1	1	1	1			1	

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0044-C3AS	08A-044-C3	8/19/2008 13:26	0	0.5				1		1			1	1	1					1								1		
	08A-0044-C3BS	08A-044-C3	8/19/2008 13:26	0.5	1.5				1		1			1	1	1			1		1						1		1		
	08A-0044-C3CS	08A-044-C3	8/19/2008 13:26	1.5	2.5									1	1	1													1		
	08A-0044-C3DS	08A-044-C3	8/19/2008 13:26	2.5	3.5									1	1														1		
	08A-0044-C3ES	08A-044-C3	8/19/2008 13:26	3.5	5.5				1		1			1	1				1		1										
	08A-0044-G1AS	08A-044-G1	8/19/2008 14:25	0	0.1			1					1																		
	08A-0044-G2AS	08A-044-G2	8/19/2008 14:40	0	0.5					1																		1			1
045	08A-0045-C1AS	08A-045-C1	8/20/2008 8:04	0	0.5		1		1		1			1	1						1								1		
	08A-0045-C1BS	08A-045-C1	8/20/2008 8:04	0.5	1.5									1	1	1											1		1		
	08A-0045-C1CS	08A-045-C1	8/20/2008 8:04	1.5	2.5				1		1			1	1	1			1		1								1		
	08A-0045-C1DS	08A-045-C1	8/20/2008 8:04	2.5	3.5				1		1			1	1				1		1										
	08A-0045-C1ES	08A-045-C1	8/20/2008 8:04	3.5	5.5				1		1			1	1				1		1								1		
	08A-0045-C1FS	08A-045-C1	8/20/2008 8:04	5.5	7.5									1	1														1		
	08A-0045-C2AS	08A-045-C2	8/20/2008 8:47	0	0.5			1				1				1		1		1			1	1	1	1	1				
	08A-0045-C2BS	08A-045-C2	8/20/2008 8:47	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1					
	08A-0045-C2CS	08A-045-C2	8/20/2008 8:47	1.5	2.5						1							1		1			1	1	1	1	1				
	08A-0045-C2DS	08A-045-C2	8/20/2008 8:47	2.5	3.5							1				1		1		1			1	1	1	1	1		1		1
	08A-0045-C2ES	08A-045-C2	8/20/2008 8:47	3.5	5.5							1				1		1		1			1	1	1	1	1				
	08A-0045-C2FS	08A-045-C2	8/20/2008 8:47	5.5	7.5				1		1	1				1		1	1	1	1		1	1	1	1	1				
	08A-0045-C2GS	08A-045-C2	8/20/2008 8:47	7.5	9.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0045-C2HS	08A-045-C2	8/20/2008 8:47	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0045-C2IS	08A-045-C2	8/20/2008 8:47	11.5	13				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0045-G1AS	08A-045-G1	8/20/2008 9:37	0	0.1			1					1																		
	08A-0045-G2AS	08A-045-G2	8/20/2008 9:53	0	0.5	1																1							1		1
	08A-0045-G3AS	08A-045-G3	8/20/2008 10:37	0	0.5					1							1											1			
046	08A-0046-C2AS	08A-046-C2	8/20/2008 11:40	0	0.5			1	1		1	1						1		1	1		1	1	1	1	1				
	08A-0046-C2BS	08A-046-C2	8/20/2008 11:40	0.5	2						1				1					1	1				1		1		1		1
047	08A-0047-C1AS	08A-047-C1	7/30/2008 8:54	0	0.5			1				1						1		1			1	1	1	1					
	08A-0047-C1BS	08A-047-C1	7/30/2008 8:54	0.5	1.5							1						1		1			1	1	1	1	1				
	08A-0047-C1CS	08A-047-C1	7/30/2008 8:54	1.5	2.5							1						1		1			1	1	1	1	1				
	08A-0047-C1DS	08A-047-C1	7/30/2008 8:54	2.5	3.5							1						1		1			1	1	1	1	1				1
	08A-0047-C1ES	08A-047-C1	7/30/2008 8:54	3.5	5.2				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0047-C1FS	08A-047-C1	7/30/2008 8:54	5.2	7.17						1			1	1				1	1	1				1		1		1		1

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0047-C4AS	08A-047-C4	7/30/2008 11:39	0	0.5				1		1			1	1	1					1						1		1		
	08A-0047-C4BS	08A-047-C4	7/30/2008 11:39	0.5	1.5				1		1			1	1	1					1								1		
	08A-0047-C4CS	08A-047-C4	7/30/2008 11:39	1.5	2.5				1		1			1	1	1					1								1		
	08A-0047-C4DS	08A-047-C4	7/30/2008 11:39	2.5	3.45				1		1			1	1	1					1								1		
	08A-0047-G1AS	08A-047-G1	7/30/2008 12:34	0	0.1			1					1																		
	08A-0047-G2AS	08A-047-G2	7/30/2008 13:01	0	0.5					1																	1				1
047D	08A-0047-D4AS	08A-0047-D4	12/9/2008 14:05	0	0.07						1	1			1	1		1		1	1			1	1		1				
	08A-0047-D4BS	08A-0047-D4	12/9/2008 14:05	0.07	0.16						1	1			1	1		1		1	1			1	1		1				
	08A-0047-D4CS	08A-0047-D4	12/9/2008 14:05	0.16	0.33						1	1			1	1		1		1	1			1	1		1				
	08A-0047-D4DS	08A-0047-D4	12/9/2008 14:05	0.33	0.98						1	1			1	1		1		1	1			1	1		1				
	08A-0047-D4ES	08A-0047-D4	12/9/2008 14:05	0.98	1.97						1	1			1	1		1		1	1			1	1		1				
048	08A-0048-C2AS	08A-048-C2	7/31/2008 9:22	0	0.5			1				1				1		1		1			1	1	1	1	1				
	08A-0048-C2BS	08A-048-C2	7/31/2008 9:22	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0048-C2CS	08A-048-C2	7/31/2008 9:22	1.5	2.5							1				1		1		1			1	1	1	1	1		1		
	08A-0048-C2DS	08A-048-C2	7/31/2008 9:22	2.5	3.5							1						1		1			1	1	1	1	1				1
	08A-0048-C2ES	08A-048-C2	7/31/2008 9:22	3.5	5.5							1		1	1			1		1			1	1	1	1	1				
	08A-0048-C2FS	08A-048-C2	7/31/2008 9:22	5.5	7.3						1				1					1	1				1		1				1
	08A-0048-C3AS	08A-048-C3	7/31/2008 10:29	0	0.5				1		1			1	1						1								1		
	08A-0048-C3BS	08A-048-C3	7/31/2008 10:29	0.5	1.5				1		1			1	1						1								1		
	08A-0048-C3CS	08A-048-C3	7/31/2008 10:29	1.5	2.5				1		1			1	1						1										
	08A-0048-C3DS	08A-048-C3	7/31/2008 10:29	2.5	3.5				1		1			1	1	1					1								1		
	08A-0048-C3ES	08A-048-C3	7/31/2008 10:29	3.5	5.5				1		1					1					1						1		1		
	08A-0048-G1AS	08A-048-G1	7/31/2008 12:03	0	0.1			1					1																		
	08A-0048-G2AS	08A-048-G2	7/31/2008 12:21	0	0.5					1																	1				1
049	08A-0049-C1AS	08A-049-C1	8/6/2008 7:41	0	0.5			1	1		1	1				1		1		1	1		1	1	1	1	1				
	08A-0049-C1BS	08A-049-C1	8/6/2008 7:41	0.5	1.5				1		1	1				1		1	1	1	1		1	1	1	1	1				
	08A-0049-C1CS	08A-049-C1	8/6/2008 7:41	1.5	2.5				1		1	1				1		1	1	1	1		1	1	1	1	1				
	08A-0049-C1DS	08A-049-C1	8/6/2008 7:41	2.5	3.5							1						1		1			1	1	1	1	1				1
	08A-0049-C2AS	08A-049-C2	8/6/2008 8:26	0	0.5									1	1														1		
	08A-0049-C2BS	08A-049-C2	8/6/2008 8:26	0.5	1.5									1	1														1		
	08A-0049-C2CS	08A-049-C2	8/6/2008 8:26	1.5	2.5									1	1														1		
	08A-0049-C2DS	08A-049-C2	8/6/2008 8:26	2.5	3.5				1		1			1	1	1			1		1								1		
	08A-0049-C2ES	08A-049-C2	8/6/2008 8:26	3.5	5.2				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0049-G1AS	08A-049-G1	8/6/2008 9:15	0	0.1			1					1																		
	08A-0049-G3AS	08A-049-G3	8/6/2008 9:40	0	0.5					1			1														1				1
050	08A-0050-C1AS	08A-050-C1	9/3/2008 7:56	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0050-C1BS	08A-050-C1	9/3/2008 7:56	0.5	1.5							1						1						1	1	1					
	08A-0050-C1CS	08A-050-C1	9/3/2008 7:56	1.5	2.5							1						1						1	1	1			1		
	08A-0050-C1DS	08A-050-C1	9/3/2008 7:56	2.5	3.24							1		1	1			1		1			1	1	1	1					1
	08A-0050-C2AS	08A-050-C2	9/3/2008 8:25	0	0.5				1		1			1	1	1					1								1		
	08A-0050-C2BS	08A-050-C2	9/3/2008 8:25	0.5	1.5									1	1	1				1			1				1				
	08A-0050-C2CS	08A-050-C2	9/3/2008 8:25	1.5	2.5				1		1					1			1	1	1		1				1				
	08A-0050-C3BS	08A-050-C3	9/3/2008 8:51	0.5	1.5				1		1								1		1								1		
	08A-0050-C3CS	08A-050-C3	9/3/2008 8:51	1.5	2.5									1	1																
051	08A-0051-C1AS	08A-051-C1	8/26/2008 8:01	0	0.5			1				1						1		1			1	1	1	1					
	08A-0051-C1BS	08A-051-C1	8/26/2008 8:01	0.5	1.5							1				1		1					1	1	1	1	1				1
	08A-0051-C2AS	08A-051-C2	8/26/2008 8:28	0	0.5				1		1			1	1	1					1						1		1		
	08A-0051-C2BS	08A-051-C2	8/26/2008 8:28	0.5	1.5				1		1			1	1				1	1	1						1		1		
	08A-0051-C2CS	08A-051-C2	8/26/2008 8:28	1.5	2.5						1					1							1	1	1	1	1				1
	08A-0051-C4CS	08A-051-C4	8/26/2008 9:03	1.5	2.5				1		1			1	1				1	1	1								1		
	08A-0051-G1AS	08A-051-G1	8/26/2008 10:04	0	0.1			1					1																		
	08A-0051-G2AS	08A-051-G2	8/26/2008 10:15	0	0.5					1																		1			1
052	08A-0052-C2AS	08A-052-C2	8/26/2008 11:10	0	0.5			1				1						1		1			1	1	1	1					
	08A-0052-C3AS	08A-052-C3	8/26/2008 11:46	0	0.5				1		1			1	1	1					1						1		1		
054	08A-0054-C1AS	08A-054-C1	8/27/2008 9:52	0	0.5				1		1			1	1	1			1		1						1		1		
	08A-0054-C1BS	08A-054-C1	8/27/2008 9:52	0.5	1.5									1	1	1											1		1		
	08A-0054-C1CS	08A-054-C1	8/27/2008 9:52	1.5	2.5									1	1	1													1		
	08A-0054-C3AS	08A-054-C3	8/27/2008 10:40	0	0.5			1				1						1		1			1	1	1	1					
	08A-0054-C3BS	08A-054-C3	8/27/2008 10:40	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1					
	08A-0054-C3CS	08A-054-C3	8/27/2008 10:40	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0054-C3DS	08A-054-C3	8/27/2008 10:40	2.5	3.5						1				1					1	1				1		1		1		1
055	08A-0055-C2AS	08A-055-C2	8/7/2008 8:45	0	0.5			1				1						1		1			1	1	1	1					
	08A-0055-C2BS	08A-055-C2	8/7/2008 8:45	0.5	1.5							1						1		1			1	1	1	1					
	08A-0055-C2CS	08A-055-C2	8/7/2008 8:45	1.5	2.5							1				1		1		1			1	1	1	1	1		1		
	08A-0055-C2DS	08A-055-C2	8/7/2008 8:45	2.5	3.5				1		1	1				1		1		1	1		1	1	1	1	1				1
	08A-0055-C2ES	08A-055-C2	8/7/2008 8:45	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics	
	08A-0055-C2FS	08A-055-C2	8/7/2008 8:45	5.5	7				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1			
	08A-0055-C2GS	08A-055-C2	8/7/2008 8:45	7	7.9						1				1					1	1			1	1	1	1		1		1	
	08A-0055-C3AS	08A-055-C3	8/7/2008 9:27	0	0.5				1		1			1	1	1					1						1		1			
	08A-0055-C3BS	08A-055-C3	8/7/2008 9:27	0.5	1.5				1		1			1	1	1			1		1						1		1			
	08A-0055-C3CS	08A-055-C3	8/7/2008 9:27	1.5	2.5				1		1			1	1				1		1											
	08A-0055-C3DS	08A-055-C3	8/7/2008 9:27	2.5	3.5									1	1														1			
	08A-0055-G4AS	08A-055-G4	8/7/2008 10:43	0	0.1			1					1																			
056	08A-0056-C1AS	08A-056-C1	8/27/2008 12:40	0	0.5				1		1			1	1	1					1								1			
	08A-0056-C1BS	08A-056-C1	8/27/2008 12:40	0.5	1.5				1		1			1	1	1			1		1						1		1			
	08A-0056-C1CS	08A-056-C1	8/27/2008 12:40	1.5	2.5				1		1			1	1	1			1		1							1				
	08A-0056-C1DS	08A-056-C1	8/27/2008 12:40	2.5	3.5				1		1			1	1	1			1		1							1				
	08A-0056-C2AS	08A-056-C2	8/27/2008 13:22	0	0.5			1				1						1		1			1	1	1	1	1					
	08A-0056-C2BS	08A-056-C2	8/27/2008 13:22	0.5	1.5							1						1		1			1	1	1	1						
	08A-0056-C2CS	08A-056-C2	8/27/2008 13:22	1.5	2.5							1						1		1			1	1	1	1	1					
	08A-0056-C2DS	08A-056-C2	8/27/2008 13:22	2.5	3.5							1						1		1			1	1	1	1	1				1	
	08A-0056-C2ES	08A-056-C2	8/27/2008 13:22	3.5	5.5				1		1	1		1	1	1	1		1	1	1	1		1	1	1	1		1			
	08A-0056-C2FS	08A-056-C2	8/27/2008 13:22	5.5	7.5				1		1	1		1	1	1	1		1	1	1	1		1	1	1	1		1			
	08A-0056-C2GS	08A-056-C2	8/27/2008 13:22	7.5	9.5				1		1	1		1	1	1	1		1	1	1	1		1	1	1	1		1			
	08A-0056-C2HS	08A-056-C2	8/27/2008 13:22	9.5	11.85				1		1	1		1	1	1	1		1	1	1	1		1	1	1	1		1			
	08A-0056-C2IS	08A-056-C2	8/27/2008 13:22	11.85	13.35				1		1	1		1	1	1	1		1	1	1	1		1	1	1	1		1			
	08A-0056-C2JS	08A-056-C2	8/27/2008 13:22	13.35	14.25						1				1						1	1				1		1		1		1
	08A-0056-G5AS	08A-056-G5	8/27/2008 14:22	0	0.1			1						1																		
	08A-0056-G6AS	08A-056-G6	8/27/2008 14:28	0	0.5					1																		1			1	
057	08A-0057-C1AS	08A-057-C1	8/4/2008 8:38	0	0.5			1				1						1		1			1	1	1	1	1					
	08A-0057-C1BS	08A-057-C1	8/4/2008 8:38	0.5	1.5							1						1		1			1	1	1	1	1					
	08A-0057-C1CS	08A-057-C1	8/4/2008 8:38	1.5	2.5							1						1		1			1	1	1	1	1					
	08A-0057-C1DS	08A-057-C1	8/4/2008 8:38	2.5	3.5							1				1		1		1			1	1	1	1	1				1	
	08A-0057-C1ES	08A-057-C1	8/4/2008 8:38	3.5	5.5				1		1	1		1	1	1	1		1	1	1	1		1	1	1	1		1			
	08A-0057-C1FS	08A-057-C1	8/4/2008 8:38	5.5	7.1							1						1		1			1	1	1	1	1					
	08A-0057-C1GS	08A-057-C1	8/4/2008 8:38	7.1	8				1		1	1				1		1	1	1	1		1	1	1	1	1		1		1	
	08A-0057-C2AS	08A-057-C2	8/4/2008 9:40	0	0.5				1		1			1	1	1	1				1								1			
	08A-0057-C2BS	08A-057-C2	8/4/2008 9:40	0.5	1.5				1		1			1	1	1	1		1		1								1			
08A-0057-C2CS	08A-057-C2	8/4/2008 9:40	1.5	2.5				1		1			1	1	1	1		1		1								1				

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0057-C2DS	08A-057-C2	8/4/2008 9:40	2.5	3.5				1		1			1	1				1		1								1		
	08A-0057-C2FS	08A-057-C2	8/4/2008 9:40	5.5	6.9				1		1			1	1	1			1		1								1		
	08A-0057-C2GS	08A-057-C2	8/4/2008 9:40	6.9	8									1	1																
	08A-0057-C2HS	08A-057-C2	8/4/2008 9:40	8	9.1						1				1					1	1				1		1		1		
	08A-0057-G1AS	08A-057-G1	8/4/2008 10:30	0	0.1			1					1																		
	08A-0057-G2AS	08A-057-G2	8/4/2008 10:46	0	0.5					1																	1				1
058	08A-0058-C1AS	08A-058-C1	8/11/2008 8:01	0	0.5			1				1						1		1			1	1	1	1					
	08A-0058-C1BS	08A-058-C1	8/11/2008 8:01	0.5	1.5							1						1		1			1	1	1	1					
	08A-0058-C1CS	08A-058-C1	8/11/2008 8:01	1.5	2.5							1												1	1	1					
	08A-0058-C1DS	08A-058-C1	8/11/2008 8:01	2.5	3.5							1				1		1		1			1	1	1	1	1				1
	08A-0058-C1ES	08A-058-C1	8/11/2008 8:01	3.5	5.5				1		1	1			1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0058-C1FS	08A-058-C1	8/11/2008 8:01	5.5	7.75				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0058-C1GS	08A-058-C1	8/11/2008 8:01	7.75	9.22				1		1				1					1	1				1		1		1		1
	08A-0058-C2AS	08A-058-C2	8/11/2008 9:06	0	0.5				1		1					1					1						1		1		
	08A-0058-C2BS	08A-058-C2	8/11/2008 9:06	0.5	1.5				1		1					1			1		1						1		1		
	08A-0058-C2CS	08A-058-C2	8/11/2008 9:06	1.5	2.5											1		1		1			1								
	08A-0058-C2DS	08A-058-C2	8/11/2008 9:06	2.5	3.5				1		1			1	1				1		1								1		
	08A-0058-C3AS	08A-058-C3	8/11/2008 9:28	0	0.5									1	1																
	08A-0058-C3BS	08A-058-C3	8/11/2008 9:28	0.5	1.5									1	1																
	08A-0058-C3CS	08A-058-C3	8/11/2008 9:28	1.5	2.5				1		1			1	1				1		1						1		1		
	08A-0058-G1AS	08A-058-G1	8/11/2008 9:41	0	0.1			1					1																		
	08A-0058-G4AS	08A-058-G4	8/11/2008 11:53	0	0.5					1																		1			1
059	08A-0059-C4AS	08A-059-C4	8/12/2008 9:46	0	0.5			1				1						1		1			1	1	1	1					
	08A-0059-C5AS	08A-059-C5	8/12/2008 10:49	0	0.5				1		1			1	1	1					1						1		1		
	08A-0059-G6AS	08A-059-G6	8/12/2008 12:03	0	0.1			1					1																		
	08A-0059-G8AS	08A-059-G8	8/12/2008 12:24	0	0.5					1																		1			1
060	08A-0060-C1AS	08A-060-C1	8/6/2008 15:00	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0060-C1BS	08A-060-C1	8/6/2008 15:20	0.5	1.5							1						1		1			1	1	1	1	1				
	08A-0060-C1CS	08A-060-C1	8/6/2008 15:30	1.5	2.5							1						1		1			1	1	1	1	1				
	08A-0060-C1DS	08A-060-C1	8/6/2008 15:45	2.5	3.5							1						1		1			1	1	1	1					1
	08A-0060-C1ES	08A-060-C1	8/6/2008 16:00	3.5	5.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0060-C1FS	08A-060-C1	8/6/2008 17:00	5.5	7.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0060-C1GS	08A-060-C1	8/6/2008 17:00	7.5	8.27							1								1			1	1	1	1					1

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0060-C2AS	08A-060-C2	8/6/2008 17:35	0	0.5				1		1			1	1	1					1								1		
	08A-0060-C2BS	08A-060-C2	8/6/2008 17:50	0.5	1.5				1		1			1	1	1					1								1		
	08A-0060-C2CS	08A-060-C2	8/6/2008 18:00	1.5	2.5				1		1			1	1	1					1								1		
	08A-0060-C2DS	08A-060-C2	8/6/2008 17:50	2.5	3.5				1		1			1	1	1					1						1		1		
	08A-0060-C2GS	08A-060-C2	8/6/2008 19:00	7.2	8.8				1		1			1	1	1		1			1						1		1		
	08A-0060-G1AS	08A-060-G1	8/6/2008 16:10	0	0.1			1					1																		
	08A-0060-G2AS	08A-060-G2	8/6/2008 16:15	0	0.5					1																	1				1
061	08A-0061-C1AS	08A-061-C1	9/3/2008 10:21	0	0.5			1				1						1		1			1	1	1	1					
	08A-0061-C1BS	08A-061-C1	9/3/2008 10:21	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0061-C1CS	08A-061-C1	9/3/2008 10:21	1.5	2.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0061-C1DS	08A-061-C1	9/3/2008 10:21	2.5	3.5				1		1	1						1	1	1	1		1	1	1	1					1
	08A-0061-C1ES	08A-061-C1	9/3/2008 10:21	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0061-C1FS	08A-061-C1	9/3/2008 10:21	6	6.42										1					1					1		1		1		1
	08A-0061-C2AS	08A-061-C2	9/3/2008 10:55	0	0.5				1		1			1	1	1					1						1		1		
	08A-0061-C2BS	08A-061-C2	9/3/2008 10:55	0.5	1.5				1		1			1	1				1		1								1		
	08A-0061-C2DS	08A-061-C2	9/3/2008 10:55	2.5	3.5									1	1	1											1		1		
	08A-0061-C2FS	08A-061-C2	9/3/2008 10:55	4.5	5.48						1										1										
062	08A-0062-C1AS	08A-062-C1	8/13/2008 7:34	0	0.5			1				1						1		1			1	1	1	1					
	08A-0062-C1BS	08A-062-C1	8/13/2008 7:34	0.5	1.5							1						1		1			1	1	1	1					
	08A-0062-C1CS	08A-062-C1	8/13/2008 7:34	1.5	2.5							1						1		1			1	1	1	1					
	08A-0062-C1DS	08A-062-C1	8/13/2008 7:34	2.5	3.5							1						1		1			1	1	1	1					1
	08A-0062-C1ES	08A-062-C1	8/13/2008 7:34	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0062-C1FS	08A-062-C1	8/13/2008 7:34	5.5	7.3				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0062-C1GS	08A-062-C1	8/13/2008 7:34	7.3	9.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0062-C1HS	08A-062-C1	8/13/2008 7:34	9.5	10.6				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0062-C1IS	08A-062-C1	8/13/2008 7:34	10.6	12						1				1					1	1			1	1		1		1		1
	08A-0062-C2AS	08A-062-C2	8/13/2008 8:27	0	0.5				1		1			1	1	1					1						1		1		
	08A-0062-C2BS	08A-062-C2	8/13/2008 8:27	0.5	1.5				1		1			1	1	1			1		1						1		1		
	08A-0062-C2CS	08A-062-C2	8/13/2008 8:27	1.5	2.5				1		1			1	1	1			1		1						1		1		
	08A-0062-C2DS	08A-062-C2	8/13/2008 8:27	2.5	3.5				1		1			1	1	1			1		1						1		1		
	08A-0062-G1AS	08A-062-G1	8/13/2008 8:39	0	0.1			1					1																		
	08A-0062-G2AS	08A-062-G2	8/13/2008 8:59	0	0.5					1																	1				1
062D	08A-0062-D1AS	08A-0062-D1	12/9/2008 15:20	0	0.07						1	1			1	1		1		1	1			1	1		1				

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0062-D1BS	08A-0062-D1	12/9/2008 15:20	0.07	0.16						1	1			1	1		1		1	1			1	1		1				
	08A-0062-D1CS	08A-0062-D1	12/9/2008 15:20	0.16	0.33						1	1			1	1		1		1	1			1	1		1				
	08A-0062-D1DS	08A-0062-D1	12/9/2008 15:20	0.33	0.98						1	1			1	1		1		1	1			1	1		1				
	08A-0062-D1ES	08A-0062-D1	12/9/2008 15:20	0.98	1.97						1	1			1	1		1		1	1			1	1		1				
063	08A-0063-C1AS	08A-063-C1	8/12/2008 13:19	0	0.5			1				1						1		1			1	1	1	1					
	08A-0063-C1BS	08A-063-C1	8/12/2008 13:19	0.5	1.5							1						1		1			1	1	1	1					
	08A-0063-C1CS	08A-063-C1	8/12/2008 13:19	1.5	2.6							1						1		1			1	1	1	1					
	08A-0063-C1DS	08A-063-C1	8/12/2008 13:19	2.6	3.8							1						1		1			1	1	1	1					1
	08A-0063-C1ES	08A-063-C1	8/12/2008 13:19	3.8	4.5						1				1					1	1				1		1				1
	08A-0063-C2AS	08A-063-C2	8/12/2008 14:17	0	0.5				1		1						1				1						1		1		
	08A-0063-C2BS	08A-063-C2	8/12/2008 14:17	0.5	1.5				1		1			1	1	1			1		1						1		1		
	08A-0063-C2CS	08A-063-C2	8/12/2008 14:17	1.5	2.2				1		1			1	1	1			1		1						1		1		
	08A-0063-C2DS	08A-063-C2	8/12/2008 14:17	2.2	3				1		1			1	1	1			1		1						1		1		
	08A-0063-C2ES	08A-063-C2	8/12/2008 14:17	3	3.4																								1		
	08A-0063-G3AS	08A-063-G3	8/12/2008 15:12	0	0.1			1					1																		
	08A-0063-G4AS	08A-063-G4	8/12/2008 15:25	0	0.5					1				1	1													1			1
064	08A-0064-C1AS	08A-064-C1	8/25/2008 7:24	0	0.5			1				1						1		1			1	1	1	1					
	08A-0064-C1BS	08A-064-C1	8/25/2008 7:24	0.5	1.5							1						1		1			1	1	1	1					
	08A-0064-C1CS	08A-064-C1	8/25/2008 7:24	1.5	2.5							1						1		1			1	1	1	1					1
	08A-0064-C1DS	08A-064-C1	8/25/2008 7:24	2.5	3.5						1				1					1	1				1		1		1		1
	08A-0064-C2AS	08A-064-C2	8/25/2008 7:54	0	0.5				1		1			1	1	1					1						1		1		
	08A-0064-C2BS	08A-064-C2	8/25/2008 7:54	0.5	1.5				1		1			1	1	1			1		1						1		1		
	08A-0064-C2CS	08A-064-C2	8/25/2008 7:54	1.5	2.5				1		1			1	1	1			1		1						1		1		
	08A-0064-G10AS	08A-064-G10	8/25/2008 9:24	0	0.5					1																		1			1
	08A-0064-G9AS	08A-064-G9	8/25/2008 9:12	0	0.1			1					1																		
065	08A-0065-C1AS	08A-065-C1	8/28/2008 8:02	0	0.5				1		1			1	1	1					1						1		1		
	08A-0065-C1BS	08A-065-C1	8/28/2008 8:02	0.5	1.5				1		1			1	1	1			1		1								1		
	08A-0065-C1CS	08A-065-C1	8/28/2008 8:02	1.5	2.5									1	1	1													1		
	08A-0065-C1DS	08A-065-C1	8/28/2008 8:02	2.5	3.5									1	1														1		
	08A-0065-C3AS	08A-065-C3	8/28/2008 9:14	0	0.5			1				1						1		1			1	1	1	1					
	08A-0065-C3BS	08A-065-C3	8/28/2008 9:14	0.5	1.5							1						1		1			1	1	1	1	1				
	08A-0065-C3CS	08A-065-C3	8/28/2008 9:14	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0065-C3DS	08A-065-C3	8/28/2008 9:14	2.5	3.5				1		1	1				1		1	1	1	1		1	1	1	1	1				1

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0065-C3ES	08A-065-C3	8/28/2008 9:14	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0065-C3FS	08A-065-C3	8/28/2008 9:14	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0065-C3GS	08A-065-C3	8/28/2008 9:14	7.5	9.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0065-C3HS	08A-065-C3	8/28/2008 9:14	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0065-C3IS	08A-065-C3	8/28/2008 9:14	11.5	13.8				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0065-G1AS	08A-065-G1	8/28/2008 9:48	0	0.1			1					1																		
	08A-0065-G2AS	08A-065-G2	8/28/2008 9:55	0	0.5					1																		1			1
066	08A-0066-C1AS	08A-066-C1	8/21/2008 7:24	0	0.5			1				1						1		1			1	1	1	1					
	08A-0066-C1BS	08A-066-C1	8/21/2008 7:24	0.5	1.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0066-C1CS	08A-066-C1	8/21/2008 7:24	1.5	2.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0066-C1DS	08A-066-C1	8/21/2008 7:24	2.5	3.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0066-C1ES	08A-066-C1	8/21/2008 7:24	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0066-C2AS	08A-066-C2	8/21/2008 9:17	0	0.5				1		1					1					1						1		1		
	08A-0066-G1AS	08A-066-G1	8/21/2008 8:42	0	0.1			1					1																		
	08A-0066-G2AS	08A-066-G2	8/21/2008 9:02	0	0.1					1				1	1													1			1
067	08A-0067-C2AS	08A-067-C2	8/5/2008 9:31	0	0.5			1				1						1		1			1	1	1	1					
	08A-0067-C2BS	08A-067-C2	8/5/2008 9:31	0.5	1.5							1						1		1			1	1	1	1					
	08A-0067-C2CS	08A-067-C2	8/5/2008 9:31	1.5	2.4							1						1		1			1	1	1	1					
	08A-0067-C2DS	08A-067-C2	8/5/2008 9:31	2.4	3.3							1						1		1			1	1	1	1	1				1
	08A-0067-C2ES	08A-067-C2	8/5/2008 9:31	3.3	5.2				1		1	1				1		1	1	1	1		1	1	1	1	1		1		
	08A-0067-C2FS	08A-067-C2	8/5/2008 9:31	5.2	6							1						1		1			1	1	1	1					
	08A-0067-C2GS	08A-067-C2	8/5/2008 9:31	6	6.9						1				1					1	1				1		1		1		1
	08A-0067-C3AS	08A-067-C3	8/5/2008 10:17	0	0.5		1		1		1			1	1	1					1						1		1		
	08A-0067-C3BS	08A-067-C3	8/5/2008 10:17	0.5	1.5				1		1			1	1	1			1		1						1		1		
	08A-0067-C3CS	08A-067-C3	8/5/2008 10:17	1.5	2.4				1		1			1	1	1			1		1						1		1		
	08A-0067-C3DS	08A-067-C3	8/5/2008 10:17	2.4	3.3				1		1			1	1	1			1		1								1		
	08A-0067-C3ES	08A-067-C3	8/5/2008 10:17	3.3	4.7									1	1																
	08A-0067-C3FS	08A-067-C3	8/5/2008 10:17	4.7	5.1				1		1			1	1	1			1		1						1		1		
	08A-0067-G1AS	08A-067-G1	8/5/2008 11:12	0	0.1			1					1																		
	08A-0067-G2AS	08A-067-G2	8/5/2008 11:34	0	0.5	1											1					1								1	1
	08A-0067-G3AS	08A-067-G3	8/5/2008 11:57	0	0.5					1																	1				
068	08A-0068-C1AS	08A-068-C1	9/4/2008 7:55	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0068-C1BS	08A-068-C1	9/4/2008 7:55	0.5	1.5							1						1		1			1	1	1	1	1				

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0068-C1CS	08A-068-C1	9/4/2008 7:55	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1					
	08A-0068-C1DS	08A-068-C1	9/4/2008 7:55	2.5	3.5				1		1	1						1	1	1	1		1	1	1	1	1				1
	08A-0068-C1ES	08A-068-C1	9/4/2008 7:55	3.5	5.7							1						1		1			1	1	1	1	1				
	08A-0068-C1FS	08A-068-C1	9/4/2008 7:55	5.85	8						1				1					1	1				1		1		1		1
	08A-0068-C2AS	08A-068-C2	9/4/2008 8:37	0	0.5				1		1			1	1	1					1				1				1		
	08A-0068-C2BS	08A-068-C2	9/4/2008 8:37	0.5	1.5				1		1			1	1	1			1		1								1		
	08A-0068-C2CS	08A-068-C2	9/4/2008 8:37	1.5	2.5									1	1	1											1		1		
	08A-0068-C2DS	08A-068-C2	9/4/2008 8:37	2.5	3.5									1	1	1													1		
	08A-0068-C2ES	08A-068-C2	9/4/2008 8:37	3.5	5.5				1		1			1	1	1			1		1								1		
	08A-0068-G4AS	08A-068-G4	9/4/2008 9:30	0	0.1			1					1																		
	08A-0068-G6AS	08A-068-G6	9/4/2008 9:52	0	0.5					1																		1			1
069	08A-0069-C1AS	08A-069-C1	9/4/2008 11:00	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0069-C1BS	08A-069-C1	9/4/2008 11:00	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0069-C1CS	08A-069-C1	9/4/2008 11:00	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0069-C1DS	08A-069-C1	9/4/2008 11:00	2.5	3.5							1						1		1			1	1	1	1	1				1
	08A-0069-C1ES	08A-069-C1	9/4/2008 11:00	3.5	5.35				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0069-C1FS	08A-069-C1	9/4/2008 11:00	5.35	6.96						1				1					1	1			1	1		1		1		1
	08A-0069-C2AS	08A-069-C2	9/4/2008 11:40	0	0.5				1		1			1	1	1					1								1		
	08A-0069-C2BS	08A-069-C2	9/4/2008 11:40	0.5	1.5				1		1			1	1				1		1								1		
	08A-0069-C2CS	08A-069-C2	9/4/2008 11:40	1.5	2.5									1	1	1													1		
	08A-0069-C2DS	08A-069-C2	9/4/2008 11:40	2.5	3.5				1		1			1	1	1			1		1								1		
	08A-0069-G1AS	08A-069-G1	9/4/2008 12:35	0	0.1			1					1																		
	08A-0069-G3AS	08A-069-G3	9/4/2008 12:55	0	0.5					1																		1			1
070	08A-0070-C2CS	08A-070-C2	9/2/2008 9:40	1.5	2.5									1	1	1													1		
	08A-0070-C2DS	08A-070-C2	9/2/2008 9:40	2.5	3.5				1		1					1			1		1						1		1		
	08A-0070-C3CS	08A-070-C3	9/2/2008 10:15	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0070-C3DS	08A-070-C3	9/2/2008 10:15	2.5	3.5							1		1	1			1		1			1	1	1	1					1
	08A-0070-C3ES	08A-070-C3	9/2/2008 10:15	3.5	5.21				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0070-C3FS	08A-070-C3	9/2/2008 10:15	5.21	7.31						1				1					1	1				1		1		1		1
1070	08A-1070-C1AS	08A-070-C1	9/15/2008 14:11	0	0.5				1		1			1	1	1					1						1		1		
	08A-1070-C2AS	08A-070-C2	9/15/2008 15:07	0	0.5			1				1						1		1			1	1	1	1					
071	08A-0071-C1AS	08A-071-C1	8/14/2008 7:14	0	0.5			1				1						1		1			1	1	1	1					
	08A-0071-C1BS	08A-071-C1	8/14/2008 7:14	0.5	1.5							1			1	1		1		1			1	1	1	1	1				

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatle Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics	
	08A-0071-C1CS	08A-071-C1	8/14/2008 7:14	1.5	2.5				1		1	1		1	1			1	1	1	1		1	1	1	1	1					
	08A-0071-C1DS	08A-071-C1	8/14/2008 7:14	2.5	3.45						1				1					1	1				1		1		1		1	
	08A-0071-C3AS	08A-071-C3	8/14/2008 8:12	0	0.5				1		1			1	1	1					1						1		1			
	08A-0071-C3BS	08A-071-C3	8/14/2008 8:12	0.5	1.4				1		1			1					1		1								1			
	08A-0071-C3CS	08A-071-C3	8/14/2008 8:12	1.4	1.9											1													1			
	08A-0071-G4AS	08A-071-G4	8/14/2008 8:55	0	0.1			1					1																			
	08A-0071-G5AS	08A-071-G5	8/14/2008 9:10	0	0.5					1																		1			1	
072	08A-0072-C6AS	08A-072-C6	8/18/2008 14:21	0	0.5			1				1						1		1			1	1	1	1						
	08A-0072-C6BS	08A-072-C6	8/18/2008 14:21	0.5	2						1				1					1	1				1		1		1		1	
	08A-0072-C7AS	08A-072-C7	8/18/2008 14:52	0	0.5				1		1			1	1	1					1						1		1			
073	08A-0073-C2AS	08A-073-C2	8/14/2008 11:11	0	0.5		1		1		1			1	1	1					1						1		1			
	08A-0073-C2BS	08A-073-C2	8/14/2008 11:11	0.5	1.5									1	1	1											1		1			
	08A-0073-C2CS	08A-073-C2	8/14/2008 11:11	1.5	2.5									1	1	1													1			
	08A-0073-C4AS	08A-073-C4	8/14/2008 12:16	0	0.5			1				1						1		1			1	1	1	1						
	08A-0073-C4BS	08A-073-C4	8/14/2008 12:16	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1						
	08A-0073-C4CS	08A-073-C4	8/14/2008 12:16	1.5	2.7				1		1	1						1	1	1	1		1	1	1	1	1					
	08A-0073-C4DS	08A-073-C4	8/14/2008 12:16	2.7	4						1				1					1	1				1		1		1		1	
	08A-0073-G4AS	08A-073-G4	8/14/2008 13:40	0	0.1			1					1																			
	08A-0073-G5AS	08A-073-G5	8/14/2008 13:55	0	0.5	1																1								1	1	
	08A-0073-G7AS	08A-073-G7	8/14/2008 14:26	0	0.5					1							1											1				
074	08A-0074-C1AS	08A-074-C1	8/18/2008 8:49	0	0.5				1		1			1	1	1					1							1		1		
	08A-0074-C1BS	08A-074-C1	8/18/2008 8:49	0.5	1.5				1		1			1	1				1		1											
	08A-0074-C1CS	08A-074-C1	8/18/2008 8:49	1.5	2.5				1		1			1	1	1			1		1								1			
	08A-0074-C1DS	08A-074-C1	8/18/2008 8:49	2.5	3.5				1		1			1	1				1		1											
	08A-0074-C2AS	08A-074-C2	8/18/2008 9:23	0	0.5			1				1						1		1			1	1	1	1						
	08A-0074-C2BS	08A-074-C2	8/18/2008 9:23	0.5	1.5							1				1		1		1			1	1	1	1	1		1			
	08A-0074-C2CS	08A-074-C2	8/18/2008 9:23	1.5	2.5							1						1		1			1	1	1	1	1					
	08A-0074-C2DS	08A-074-C2	8/18/2008 9:23	2.5	3.5							1				1		1		1			1	1	1	1	1		1		1	
	08A-0074-C2ES	08A-074-C2	8/18/2008 9:23	3.5	5.5				1		1	1			1	1	1		1	1	1	1		1	1	1	1		1			
	08A-0074-C2FS	08A-074-C2	8/18/2008 9:23	5.5	7.5				1		1	1			1	1	1		1	1	1	1		1	1	1	1		1			
	08A-0074-C2GS	08A-074-C2	8/18/2008 9:23	7.5	8.85				1		1	1			1	1	1		1	1	1	1		1	1	1	1		1		1	
	08A-0074-G1AS	08A-074-G1	8/18/2008 10:08	0	0.1			1					1																			
	08A-0074-G2AS	08A-074-G2	8/18/2008 10:18	0	0.5					1																		1			1	

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
075	08A-0075-C1AS	08A-075-C1	8/18/2008 10:55	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0075-C1BS	08A-075-C1	8/18/2008 10:55	0.5	1.6				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0075-C1CS	08A-075-C1	8/18/2008 10:55	1.6	3				1		1				1					1	1			1	1		1		1		1
	08A-0075-C2AS	08A-075-C2	8/18/2008 11:46	0	0.5				1		1			1	1	1					1				1				1		
	08A-0075-G1AS	08A-075-G1	8/18/2008 12:18	0	0.1			1					1																		
	08A-0075-G3AS	08A-075-G3	8/18/2008 12:35	0	0.5					1																	1				1
076	08A-0076-C4AS	08A-076-C4	9/8/2008 10:55	0	0.5				1		1			1	1	1					1						1		1		
	08A-0076-C5AS	08A-076-C5	9/8/2008 11:40	0	0.5			1				1						1		1			1	1	1	1					
	08A-0076-C5BS	08A-076-C5	9/8/2008 11:40	0.5	1.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0076-C5CS	08A-076-C5	9/8/2008 11:40	1.5	2.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0076-C5DS	08A-076-C5	9/8/2008 11:40	2.5	3.5						1				1					1	1				1		1		1		1
	08A-0076-G3AS	08A-076-G3	9/8/2008 12:38	0	0.1			1					1																		
	08A-0076-G4AS	08A-076-G4	9/8/2008 12:50	0	0.1					1																	1				1
077	08A-0077-C2AS	08A-077-C2	9/8/2008 14:05	0	0.5			1				1						1		1			1	1	1	1					
	08A-0077-C2BS	08A-077-C2	9/8/2008 14:05	0.5	1.5							1						1		1			1	1	1	1	1				
	08A-0077-C2CS	08A-077-C2	9/8/2008 14:05	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0077-C2DS	08A-077-C2	9/8/2008 14:05	2.5	3.2							1						1		1			1	1	1	1	1				1
	08A-0077-C2ES	08A-077-C2	9/8/2008 14:05	3.2	3.83						1				1					1	1				1		1		1		1
	08A-0077-C5AS	08A-077-C5	9/8/2008 15:34	0	0.5				1		1			1	1	1					1						1		1		
	08A-0077-C5BS	08A-077-C5	9/8/2008 15:34	0.5	1.5				1		1			1	1	1			1		1								1		
	08A-0077-C5CS	08A-077-C5	9/8/2008 15:34	1.5	2.5									1	1	1													1		
	08A-0077-G2AS	08A-077-G2	9/8/2008 16:11	0	0.1			1					1																		
	08A-0077-G3AS	08A-077-G3	9/8/2008 16:27	0	0.5					1																	1				1
078	08A-0078-C1AS	08A-078-C1	9/2/2008 12:55	0	0.5			1				1						1		1			1	1	1	1					
	08A-0078-C1BS	08A-078-C1	9/2/2008 12:55	0.5	1.5							1						1		1			1	1	1	1	1				
	08A-0078-C1CS	08A-078-C1	9/2/2008 12:55	1.5	2.5							1						1		1			1	1	1	1	1				
	08A-0078-C1DS	08A-078-C1	9/2/2008 12:55	2.5	3.5				1		1	1						1	1	1	1		1	1	1	1	1				1
	08A-0078-C1ES	08A-078-C1	9/2/2008 12:55	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0078-C1FS	08A-078-C1	9/2/2008 12:55	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0078-C1GS	08A-078-C1	9/2/2008 12:55	7.5	8.1							1						1		1			1	1	1	1					1
	08A-0078-C3AS	08A-078-C3	9/2/2008 14:15	0	0.5				1		1			1	1	1					1						1		1		
	08A-0078-C3BS	08A-078-C3	9/2/2008 14:15	0.5	1.5				1		1			1	1	1			1		1								1		
	08A-0078-C3CS	08A-078-C3	9/2/2008 14:15	1.5	2.5				1		1			1	1	1			1		1								1		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0078-C3DS	08A-078-C3	9/2/2008 14:15	2.5	3.5									1	1	1													1		
	08A-0078-C3GS	08A-078-C3	9/2/2008 14:15	7.5	8.5				1		1			1	1	1			1		1						1		1		
	08A-0078-G2AS	08A-078-G2	9/2/2008 14:41	0	0.1			1					1																		
	08A-0078-G4AS	08A-078-G4	9/2/2008 14:55	0	0.5					1																	1				1
078D	08A-0078-D4AS	08A-0078-D4	12/11/2008 12:50	0	0.07						1	1			1	1		1		1	1			1	1		1				
	08A-0078-D4BS	08A-0078-D4	12/11/2008 12:50	0.07	0.16						1	1			1	1		1		1	1			1	1		1				
	08A-0078-D4CS	08A-0078-D4	12/11/2008 12:50	0.16	0.33						1	1			1	1		1		1	1			1	1		1				
	08A-0078-D4DS	08A-0078-D4	12/11/2008 12:50	0.33	0.98						1	1			1	1		1		1	1			1	1		1				
	08A-0078-D4ES	08A-0078-D4	12/11/2008 12:50	0.98	1.97						1	1			1	1		1		1	1			1	1		1				
079	08A-0079-C2AS	08A-079-C2	9/9/2008 8:05	0	0.5				1		1			1	1	1					1						1		1		
	08A-0079-C2BS	08A-079-C2	9/9/2008 8:05	0.5	1.5				1		1			1	1	1			1		1						1		1		
	08A-0079-C2CS	08A-079-C2	9/9/2008 8:05	1.5	2.5				1		1			1	1	1			1		1						1		1		
	08A-0079-C2DS	08A-079-C2	9/9/2008 8:05	2.5	2.94				1		1			1	1				1		1								1		
	08A-0079-C4AS	08A-079-C4	9/9/2008 14:35	0	0.5			1				1						1		1			1	1	1	1					
	08A-0079-C4BS	08A-079-C4	9/9/2008 14:35	0.5	1.5							1						1		1			1	1	1	1					
	08A-0079-C4CS	08A-079-C4	9/9/2008 14:35	1.5	2.5							1						1		1			1	1	1	1					
	08A-0079-C4DS	08A-079-C4	9/9/2008 14:35	2.5	3.5							1				1		1		1			1	1	1	1	1				1
	08A-0079-C4ES	08A-079-C4	9/9/2008 14:35	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0079-G2AS	08A-079-G2	9/9/2008 16:02	0	0.1			1					1																		
	08A-0079-G3AS	08A-079-G3	9/9/2008 16:20	0	0.5					1																		1			1
080	08A-0080-C1AS	08A-080-C1	9/10/2008 7:17	0	0.5			1				1						1		1			1	1	1	1					
	08A-0080-C1BS	08A-080-C1	9/10/2008 7:17	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0080-C1CS	08A-080-C1	9/10/2008 7:17	1.5	2.5							1				1		1		1			1	1	1	1	1				
	08A-0080-C1DS	08A-080-C1	9/10/2008 7:17	2.5	3.5				1		1	1						1	1	1	1		1	1	1	1	1				1
	08A-0080-C1ES	08A-080-C1	9/10/2008 7:17	3.5	5.43				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1				1
	08A-0080-C2AS	08A-080-C2	9/10/2008 7:53	0	0.5				1		1			1	1	1					1						1		1		
	08A-0080-C2BS	08A-080-C2	9/10/2008 7:53	0.5	1.5									1	1	1													1		
	08A-0080-C2CS	08A-080-C2	9/10/2008 7:53	1.5	2.5				1		1			1	1				1		1								1		
	08A-0080-C2DS	08A-080-C2	9/10/2008 7:53	2.5	3.5									1	1	1													1		
	08A-0080-C2ES	08A-080-C2	9/10/2008 7:53	3.5	4.86																								1		
	08A-0080-G1AS	08A-080-G1	9/10/2008 8:38	0	0.1			1					1																		
	08A-0080-G2AS	08A-080-G2	9/10/2008 8:50	0	2.5					1																		1			1
081	08A-0081-C2AS	08A-081-C2	9/10/2008 13:33	0	0.5			1	1		1	1						1		1	1		1	1	1	1					

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0081-C2BS	08A-081-C2	9/10/2008 13:33	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1	1		1		
	08A-0081-C2CS	08A-081-C2	9/10/2008 13:33	1.5	2.5							1						1		1			1	1	1	1					
	08A-0081-C2DS	08A-081-C2	9/10/2008 13:33	2.5	3.1							1						1		1			1	1	1	1					1
	08A-0081-C3AS	08A-081-C3	9/10/2008 14:03	0	0.5									1	1	1											1		1		
	08A-0081-C3BS	08A-081-C3	9/10/2008 14:03	0.5	1.5									1	1	1															
	08A-0081-C3CS	08A-081-C3	9/10/2008 14:03	1.5	2.5				1		1			1	1	1			1		1						1		1		
	08A-0081-C3DS	08A-081-C3	9/10/2008 14:03	2.5	3.19				1		1			1	1	1			1		1						1		1		
	08A-0081-G1AS	08A-081-G1	9/10/2008 14:35	0	0.1			1					1																		
	08A-0081-G4AS	08A-081-G4	9/10/2008 14:47	0	0.5					1																		1			1
082	08A-0082-C1AS	08A-082-C1	12/10/2008 8:12	0	0.5		1		1		1			1	1	1					1								1		
	08A-0082-C1BS	08A-082-C1	12/10/2008 8:12	0.5	1.5									1	1	1													1		
	08A-0082-C1CS	08A-082-C1	12/10/2008 8:12	1.5	2.5									1	1	1													1		
	08A-0082-C1DS	08A-082-C1	12/10/2008 8:12	2.5	3.5									1	1														1		
	08A-0082-C1ES	08A-082-C1	12/10/2008 8:12	3.5	5.5				1		1			1	1	1			1		1								1		
	08A-0082-C1FS	08A-082-C1	12/10/2008 8:12	5.5	7.5									1	1																
	08A-0082-C2AS	08A-082-C2	12/10/2008 8:40	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0082-C2BS	08A-082-C2	12/10/2008 8:40	0.5	1.5				1		1	1						1		1	1		1	1	1	1	1				
	08A-0082-C2CS	08A-082-C2	12/10/2008 8:40	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0082-C2DS	08A-082-C2	12/10/2008 8:40	2.5	3.5				1		1	1				1		1		1	1		1	1	1	1	1				1
	08A-0082-C2ES	08A-082-C2	12/10/2008 8:40	3.5	5.5							1						1		1			1	1	1	1	1				
	08A-0082-C2FS	08A-082-C2	12/10/2008 8:40	5.5	7.5				1		1	1				1		1		1	1		1	1	1	1	1		1		
	08A-0082-C2GS	08A-082-C2	12/10/2008 8:40	7.5	9.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0082-C2HS	08A-082-C2	12/10/2008 8:40	9.5	11.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0082-C2IS	08A-082-C2	12/10/2008 8:40	11.5	13.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0082-C2JS	08A-082-C2	12/10/2008 8:40	13.5	15.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0082-C2KS	08A-082-C2	12/10/2008 8:40	15.5	16.9				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0082-C2LS	08A-082-C2	12/10/2008 8:40	16.9	18.9				1		1			1	1					1	1			1	1		1		1		1
	08A-0082-G1AS	08A-082-G1	12/10/2008 11:05	0	0.1			1																							
	08A-0082-G1BS	08A-082-G1	12/10/2008 11:05	0.1	0.5								1																		
	08A-0082-G2AS	08A-082-G2	12/10/2008 11:15	0	0.5	1											1					1							1		1
	08A-0082-G3BS	08A-082-G3	12/10/2008 11:20	0	0.5					1																		1			
083	08A-0083-C1AS	08A-083-C1	9/11/2008 8:00	0	0.5				1		1			1	1						1								1		
	08A-0083-C1BS	08A-083-C1	9/11/2008 8:00	0.5	1.5				1		1			1	1	1			1		1								1		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0083-C1CS	08A-083-C1	9/11/2008 8:00	1.5	2.5				1		1			1	1				1		1								1		
	08A-0083-C1DS	08A-083-C1	9/11/2008 8:00	2.5	3.5									1	1	1													1		
	08A-0083-C1ES	08A-083-C1	9/11/2008 8:00	3.5	3.69				1		1			1	1	1			1		1					1					1
	08A-0083-C2AS	08A-083-C2	9/11/2008 8:35	0	0.5			1				1				1		1		1			1	1	1	1	1				
	08A-0083-C2BS	08A-083-C2	9/11/2008 8:35	0.5	1.5							1						1		1			1	1	1	1	1				
	08A-0083-C2CS	08A-083-C2	9/11/2008 8:35	1.5	2.5							1				1		1		1			1	1	1	1	1				
	08A-0083-C2DS	08A-083-C2	9/11/2008 8:35	2.5	3.5				1		1	1						1	1	1	1		1	1	1	1	1				1
	08A-0083-C2ES	08A-083-C2	9/11/2008 8:35	3.5	4.14							1						1		1			1	1	1	1					
	08A-0083-G2AS	08A-083-G2	9/11/2008 9:31	0	0.1			1					1																		
	08A-0083-G3AS	08A-083-G3	9/11/2008 9:45	0	0.5					1																	1				1
084	08A-0084-C1AS	08A-0084-C1	12/9/2008 9:43	0	0.5			1				1				1		1		1			1	1	1	1	1			1	
	08A-0084-C1BS	08A-0084-C1	12/9/2008 9:43	0.5	1.5							1						1		1			1	1	1	1	1				
	08A-0084-C1CS	08A-0084-C1	12/9/2008 9:43	1.5	2.5							1				1		1		1			1	1	1	1	1				
	08A-0084-C1DS	08A-0084-C1	12/9/2008 9:43	2.5	3.5							1						1		1			1	1	1	1					1
	08A-0084-C1ES	08A-0084-C1	12/9/2008 9:43	3.5	5.5				1		1	1		1	1			1		1	1			1	1	1			1		
	08A-0084-C1FS	08A-0084-C1	12/9/2008 9:43	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0084-C1GS	08A-0084-C1	12/9/2008 9:43	7.5	9.8				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0084-C1HS	08A-0084-C1	12/9/2008 9:43	9.8	11.8						1				1					1	1				1		1		1		1
	08A-0084-C2AS	08A-0084-C2	12/9/2008 10:30	0	0.5				1		1			1	1						1										
	08A-0084-C2BS	08A-0084-C2	12/9/2008 10:30	0.5	1.5				1		1			1	1	1			1		1								1		
	08A-0084-C2CS	08A-0084-C2	12/9/2008 10:30	1.5	2.5				1		1			1	1						1								1		
	08A-0084-C2DS	08A-0084-C2	12/9/2008 10:30	2.5	3.5				1		1			1	1	1			1		1						1		1		
	08A-0084-C2ES	08A-0084-C2	12/9/2008 10:30	3.5	5.5											1							1				1				
	08A-0084-G1AS	08A-0084-G1	12/9/2008 11:05	0	0.1			1																							
	08A-0084-G1BS	08A-0084-G1	12/9/2008 11:05	0.1	0.5								1																		
	08A-0084-G2AS	08A-0084-G2	12/9/2008 11:17	0	0.5					1																	1				1
085	08A-0085-C1AS	08A-085-C1	12/11/2008 8:45	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0085-C1BS	08A-085-C1	12/11/2008 8:45	0.5	1.5							1						1		1			1	1	1	1	1				
	08A-0085-C1CS	08A-085-C1	12/11/2008 8:45	1.5	2.5							1						1		1			1	1	1	1	1				
	08A-0085-C1DS	08A-085-C1	12/11/2008 8:45	2.5	3.5				1		1	1						1	1	1	1		1	1	1	1	1				1
	08A-0085-C1ES	08A-085-C1	12/11/2008 8:45	3.5	5.5							1		1	1			1		1			1	1	1	1					
	08A-0085-C1FS	08A-085-C1	12/11/2008 8:45	5.5	7.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0085-C1GS	08A-085-C1	12/11/2008 8:45	7.5	9.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0085-C1HS	08A-085-C1	12/11/2008 8:45	9.5	11.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0085-C1IS	08A-085-C1	12/11/2008 8:45	11.5	13.5				1		1	1		1	1	1		1		1	1		1	1	1	1	1		1		
	08A-0085-C1JS	08A-085-C1	12/11/2008 8:45	13.5	15							1		1	1			1		1			1	1	1	1	1				1
	08A-0085-C2AS	08A-085-C2	12/11/2008 9:50	0	0.5				1		1			1	1	1					1								1		
	08A-0085-C2BS	08A-085-C2	12/11/2008 9:50	0.5	1.5				1		1			1	1	1			1		1								1		
	08A-0085-C2CS	08A-085-C2	12/11/2008 9:50	1.5	2.5				1		1			1	1	1					1								1		
	08A-0085-C2DS	08A-085-C2	12/11/2008 9:50	2.5	3.5									1	1	1													1		
	08A-0085-C2ES	08A-085-C2	12/11/2008 9:50	3.5	5.5				1		1					1					1						1		1		
	08A-0085-C2FS	08A-085-C2	12/11/2008 9:50	5.5	7.5									1	1	1													1		
086	08A-0086-C1AS	08A-086-C1	9/16/2008 7:41	0	0.5									1	1	1													1		
	08A-0086-C1BS	08A-086-C1	9/16/2008 7:41	0.5	1.5				1		1							1	1		1						1				
	08A-0086-C1CS	08A-086-C1	9/16/2008 7:41	1.5	2.5				1		1							1	1		1										
	08A-0086-C3AS	08A-086-C3	9/16/2008 8:37	0	0.5			1	1		1	1						1			1	1		1	1	1	1				
	08A-0086-C3BS	08A-086-C3	9/16/2008 8:37	0.5	1.5							1								1			1	1	1	1					
	08A-0086-C3CS	08A-086-C3	9/16/2008 8:37	1.5	2.5							1								1			1	1	1	1					
	08A-0086-C3DS	08A-086-C3	9/16/2008 8:37	2.5	3.5							1				1		1		1			1	1	1	1	1		1		1
	08A-0086-C3ES	08A-086-C3	9/16/2008 8:37	3.5	4.85				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0086-C5BS	08A-086-C5	9/16/2008 11:32	0.5	1.5									1	1	1													1		
	08A-0086-C5CS	08A-086-C5	9/16/2008 11:32	1.5	2.5									1	1	1											1		1		
	08A-0086-C5DS	08A-086-C5	9/16/2008 11:32	2.5	3.5				1		1			1	1				1		1										
	08A-0086-G2AS	08A-086-G2	9/16/2008 10:30	0	0.1			1					1																		
	08A-0086-G4AS	08A-086-G4	9/16/2008 10:45	0	0.5					1																		1			1
087	08A-0087-C2AS	08A-087-C2	9/16/2008 12:08	0	0.5									1	1														1		
	08A-0087-C2BS	08A-087-C2	9/16/2008 12:08	0.5	1.5									1	1	1													1		
	08A-0087-C2CS	08A-087-C2	9/16/2008 12:08	1.5	2.5									1	1																
	08A-0087-C2DS	08A-087-C2	9/16/2008 12:08	2.5	3.5									1	1														1		
	08A-0087-C3AS	08A-087-C3	9/16/2008 12:39	0	0.5			1	1		1	1				1		1		1	1		1	1	1	1	1				
	08A-0087-C3BS	08A-087-C3	9/16/2008 12:39	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0087-C3CS	08A-087-C3	9/16/2008 12:39	1.5	2.5				1		1	1				1		1	1	1	1		1	1	1	1	1		1		
	08A-0087-C3DS	08A-087-C3	9/16/2008 12:39	2.5	3.5				1		1	1				1		1	1	1	1		1	1	1	1	1				1
088	08A-0088-C1AS	08A-088-C1	9/17/2008 7:50	0	0.5			1				1												1	1	1					
	08A-0088-C1BS	08A-088-C1	9/17/2008 7:50	0.5	1.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0088-C1CS	08A-088-C1	9/17/2008 7:50	1.5	2.1							1						1		1			1	1	1	1					1

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0088-C2AS	08A-088-C2	9/17/2008 8:20	0	0.5		1		1		1					1		1		1	1		1				1				
	08A-0088-C2CS	08A-088-C2	9/17/2008 8:20	1.5	2.5				1		1			1	1	1			1		1						1		1		
	08A-0088-C3AS	08A-088-C3	9/17/2008 8:50	0	0.5									1	1														1		
089	08A-0089-C2AS	08A-089-C2	9/17/2008 10:55	0	0.5			1				1				1		1		1			1	1	1	1	1				
	08A-0089-C2BS	08A-089-C2	9/17/2008 10:55	0.5	1.5							1						1						1	1	1			1		
	08A-0089-C2CS	08A-089-C2	9/17/2008 10:55	1.5	2.5							1				1		1					1	1	1	1	1		1		
	08A-0089-C2DS	08A-089-C2	9/17/2008 10:55	2.5	3.5							1						1		1			1	1	1	1	1				1
	08A-0089-C2ES	08A-089-C2	9/17/2008 10:55	3.5	4.7				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0089-C4AS	08A-089-C4	9/17/2008 12:12	0	0.5				1		1			1	1						1								1		
	08A-0089-C4BS	08A-089-C4	9/17/2008 12:12	0.5	1.5				1		1			1	1	1			1	1	1		1				1				
	08A-0089-C4CS	08A-089-C4	9/17/2008 12:12	1.5	2.5				1		1			1	1				1	1	1										
	08A-0089-C4DS	08A-089-C4	9/17/2008 12:12	2.5	3.5				1		1			1	1	1			1		1								1		
	08A-0089-G2AS	08A-089-G2	9/17/2008 13:38	0	0.1			1					1																		
090	08A-0090-C1AS	08A-090-C1	9/11/2008 11:13	0	0.5				1		1			1	1	1					1								1		
	08A-0090-C1BS	08A-090-C1	9/11/2008 11:13	0.5	0.8											1													1		
	08A-0090-C5AS	08A-090-C5	9/11/2008 12:57	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0090-C5BS	08A-090-C5	9/11/2008 12:57	0.5	1.5				1		1	1		1	1			1	1	1	1		1	1	1	1	1				1
092	08A-0092-C1AS	08A-092-C1	9/25/2008 9:44	0	0.7			1				1											1	1	1	1					
	08A-0092-C1BS	08A-092-C1	9/25/2008 9:44	0.7	2.7						1				1					1	1				1		1		1		1
	08A-0092-C3AS	08A-092-C3	9/25/2008 10:31	0	0.5									1	1																
	08A-0092-C4AS	08A-092-C4	9/25/2008 10:55	0	0.75				1		1					1		1		1	1						1		1		
096	08A-0096-C2AS	08A-096-C2	9/24/2008 9:43	0	0.5				1		1			1	1	1					1						1		1		
	08A-0096-C2BS	08A-096-C2	9/24/2008 9:43	0.5	1.04				1		1			1	1				1		1										
	08A-0096-C3AS	08A-096-C3	9/24/2008 9:51	0	0.5			1				1						1		1			1	1	1	1					
	08A-0096-C3BS	08A-096-C3	9/24/2008 9:51	0.5	1.42							1				1		1		1			1	1	1	1	1		1		1
	08A-0096-G1AS	08A-096-G1	9/24/2008 10:05	0	0.1			1					1																		
	08A-0096-G2AS	08A-096-G2	9/24/2008 10:16	0	0.5					1																		1			1
098	08A-0098-C1AS	08A-098-C1	10/1/2008 8:50	0	0.5			1				1				1		1		1			1	1	1	1	1		1		
	08A-0098-C1BS	08A-098-C1	10/1/2008 8:50	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0098-C1CS	08A-098-C1	10/1/2008 8:50	1.5	2.5							1				1		1		1			1	1	1	1	1		1		
	08A-0098-C1DS	08A-098-C1	10/1/2008 8:50	2.5	3.5							1				1		1		1			1	1	1	1	1		1		1
	08A-0098-C1ES	08A-098-C1	10/1/2008 8:50	3.5	5.5				1		1	1				1		1	1	1	1		1	1	1	1	1		1		
	08A-0098-C1FS	08A-098-C1	10/1/2008 8:50	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0098-C1GS	08A-098-C1	10/1/2008 8:50	7.5	7.95							1						1		1			1	1	1	1					1
	08A-0098-C2AS	08A-098-C2	10/1/2008 9:44	0	0.5				1		1			1	1			1			1			1							
	08A-0098-C2BS	08A-098-C2	10/1/2008 9:44	0.5	1.5									1	1	1													1		
	08A-0098-C2CS	08A-098-C2	10/1/2008 9:44	1.5	2.5				1		1			1	1				1		1										
	08A-0098-C2DS	08A-098-C2	10/1/2008 9:44	2.5	3.5				1		1			1	1				1		1										
	08A-0098-C2ES	08A-098-C2	10/1/2008 9:44	3.5	5.5									1	1																
	08A-0098-C2GS	08A-098-C2	10/1/2008 9:44	7.5	8.09				1		1			1	1	1			1		1						1		1		
	08A-0098-G1AS	08A-098-G1	10/1/2008 12:34	0	0.1			1																							
	08A-0098-G1BS	08A-098-G1	10/1/2008 12:34	0.1	0.5								1																		
	08A-0098-G3AS	08A-098-G3	10/1/2008 12:45	0	0.5					1																		1			1
099	08A-0099-C1AS	08A-099-C1	10/1/2008 10:34	0	0.5			1				1				1		1		1			1	1	1	1	1				
	08A-0099-C1BS	08A-099-C1	10/1/2008 10:34	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0099-C1CS	08A-099-C1	10/1/2008 10:34	1.5	2.5							1						1		1			1	1	1	1					
	08A-0099-C1DS	08A-099-C1	10/1/2008 10:34	2.5	3.5							1				1		1		1			1	1	1	1	1				1
	08A-0099-C1ES	08A-099-C1	10/1/2008 10:34	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0099-C1FS	08A-099-C1	10/1/2008 10:34	5.5	7.3				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0099-C2AS	08A-099-C2	10/1/2008 11:14	0	0.5				1		1			1	1						1								1		
	08A-0099-C2BS	08A-099-C2	10/1/2008 11:14	0.5	1.5				1		1			1	1				1		1								1		
	08A-0099-C2CS	08A-099-C2	10/1/2008 11:14	1.5	2.5				1		1			1	1	1			1		1						1		1		
	08A-0099-C2DS	08A-099-C2	10/1/2008 11:14	2.5	3.5				1		1			1	1				1		1								1		
	08A-0099-G2AS	08A-099-G2	10/1/2008 11:56	0	0.1			1																							
	08A-0099-G2BS	08A-099-G2	10/1/2008 11:56	0.1	0.5								1																		
	08A-0099-G3AS	08A-099-G3	10/1/2008 12:05	0	0.5					1																	1				1
100	08A-0100-C1AS	08A-100-C1	9/30/2008 11:20	0	0.5			1				1				1		1		1			1	1	1	1	1				
	08A-0100-C1BS	08A-100-C1	9/30/2008 11:20	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0100-C1CS	08A-100-C1	9/30/2008 11:20	1.5	2.5							1				1		1		1			1	1	1	1			1		
	08A-0100-C1DS	08A-100-C1	9/30/2008 11:20	2.5	3.2							1						1		1			1	1	1	1					1
	08A-0100-C2AS	08A-100-C2	9/30/2008 12:10	0	0.5		1		1		1			1	1						1								1		
	08A-0100-C2BS	08A-100-C2	9/30/2008 12:10	0.5	1.5									1	1	1													1		
	08A-0100-C2CS	08A-100-C2	9/30/2008 12:10	1.5	2.5				1		1			1	1				1		1						1				
	08A-0100-C2DS	08A-100-C2	9/30/2008 12:10	2.5	3.26				1		1			1	1	1			1		1						1		1		
	08A-0100-G1AS	08A-100-G1	9/30/2008 12:56	0	0.1			1																							
	08A-0100-G1BS	08A-100-G1	9/30/2008 12:56	0.1	0.5								1																		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatle Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics	
	08A-0100-G2AS	08A-100-G2	9/30/2008 13:08	0	0.5	1																1								1	1	
	08A-0100-G3AS	08A-100-G3	9/30/2008 13:19	0	0.5					1							1											1				
101	08A-0101-C1AS	08A-101-C1	10/2/2008 8:15	0	0.5			1				1						1		1			1	1	1	1						
	08A-0101-C1BS	08A-101-C1	10/2/2008 8:15	0.5	1.5							1				1		1		1			1	1	1	1	1					
	08A-0101-C1CS	08A-101-C1	10/2/2008 8:15	1.5	2.5							1				1		1		1			1	1	1	1	1					
	08A-0101-C1DS	08A-101-C1	10/2/2008 8:15	2.5	3.5							1				1		1		1			1	1	1	1	1		1		1	
	08A-0101-C1ES	08A-101-C1	10/2/2008 8:15	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1			
	08A-0101-C1FS	08A-101-C1	10/2/2008 8:15	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1			
	08A-0101-C1GS	08A-101-C1	10/2/2008 8:15	7.5	8.1				1		1	1		1	1			1	1	1	1		1	1	1	1	1				1	
	08A-0101-C2AS	08A-101-C2	10/2/2008 9:04	0	0.5				1		1			1	1	1					1						1		1			
	08A-0101-C2BS	08A-101-C2	10/2/2008 9:04	0.5	1.5				1		1			1	1					1		1							1			
	08A-0101-C2CS	08A-101-C2	10/2/2008 9:04	1.5	2.5				1		1			1	1					1		1							1			
	08A-0101-C2DS	08A-101-C2	10/2/2008 9:04	2.5	2.89				1		1			1	1					1		1										
	08A-0101-G1AS	08A-101-G1	10/2/2008 9:54	0	0.1			1																								
	08A-0101-G1BS	08A-101-G1	10/2/2008 9:54	0.1	0.5								1																			
	08A-0101-G2AS	08A-101-G2	10/2/2008 10:05	0	0.5						1																		1			1
103	08A-0103-C1AS	08A-103-C1	9/30/2008 8:54	0	0.5			1				1						1		1			1	1	1	1	1					
	08A-0103-C1BS	08A-103-C1	9/30/2008 8:54	0.5	1.5											1													1			
	08A-0103-C1CS	08A-103-C1	9/30/2008 8:54	1.5	2.5				1		1								1		1											
	08A-0103-C1DS	08A-103-C1	9/30/2008 8:54	2.5	3.5											1													1			
	08A-0103-C1ES	08A-103-C1	9/30/2008 8:54	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1			
	08A-0103-C1FS	08A-103-C1	9/30/2008 8:54	5.5	7.09				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1	
	08A-0103-C2AS	08A-103-C2	9/30/2008 9:44	0	0.5				1		1			1	1	1					1								1			
	08A-0103-C2BS	08A-103-C2	9/30/2008 9:44	0.5	1.5				1		1	1		1	1			1	1	1	1		1	1	1	1	1					
	08A-0103-C2CS	08A-103-C2	9/30/2008 9:44	1.5	2.5							1		1	1	1		1		1			1	1	1	1	1		1			
	08A-0103-C2DS	08A-103-C2	9/30/2008 9:44	2.5	3.5				1		1	1		1	1			1	1	1	1		1	1	1	1	1				1	
	08A-0103-G1AS	08A-103-G1	9/30/2008 10:28	0	0.1			1																								
	08A-0103-G1BS	08A-103-G1	9/30/2008 10:28	0.1	0.5								1																			
	08A-0103-G2AS	08A-103-G2	9/30/2008 10:42	0	0.5						1																		1			1
	104	08A-0104-C1AS	08A-104-C1	9/29/2008 11:26	0	0.5			1				1						1		1			1	1	1	1					
08A-0104-C1BS		08A-104-C1	9/29/2008 11:26	0.5	1.5							1						1		1			1	1	1	1						
08A-0104-C1CS		08A-104-C1	9/29/2008 11:26	1.5	2.5				1		1	1				1		1	1	1	1		1	1	1	1	1					
08A-0104-C1DS		08A-104-C1	9/29/2008 11:26	2.5	3.5							1						1		1			1	1	1	1	1				1	

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics	
	08A-0104-C1ES	08A-104-C1	9/29/2008 11:26	3.5	5.5				1		1	1		1	1			1	1	1	1		1	1	1	1	1					
	08A-0104-C1FS	08A-104-C1	9/29/2008 11:26	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1			
	08A-0104-C1GS	08A-104-C1	9/29/2008 11:26	7.5	9.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1	
	08A-0104-C2AS	08A-104-C2	9/29/2008 12:18	0	0.5				1		1			1	1	1					1						1		1			
	08A-0104-C2BS	08A-104-C2	9/29/2008 12:18	0.5	1.5				1		1			1	1	1			1		1						1		1			
	08A-0104-C2CS	08A-104-C2	9/29/2008 12:18	1.5	2.5									1	1														1			
	08A-0104-C2DS	08A-104-C2	9/29/2008 12:18	2.5	3.5				1		1			1	1	1			1		1								1			
	08A-0104-C2ES	08A-104-C2	9/29/2008 12:18	3.5	5.5											1													1			
	08A-0104-G1AS	08A-104-G1	9/29/2008 13:06	0	0.1			1																								
	08A-0104-G1BS	08A-104-G1	9/29/2008 13:06	0.1	0.5								1																			
	08A-0104-G2AS	08A-104-G2	9/29/2008 13:18	0	0.5					1																		1			1	
105	08A-0105-C2AS	08A-105-C2	9/18/2008 8:21	0	0.5			1				1												1	1	1						
	08A-0105-C3AS	08A-105-C3	9/18/2008 8:51	0	0.5				1		1			1	1	1		1		1	1		1				1		1			
	08A-0105-G1AS	08A-105-G1	9/18/2008 9:08	0	0.1			1					1																			
	08A-0105-G2AS	08A-105-G2	9/18/2008 9:15	0	0.5					1																		1			1	
106	08A-0106-C1AS	08A-106-C1	9/22/2008 11:02	0	0.5			1	1		1	1		1	1	1		1		1	1		1	1	1	1	1		1			
107	08A-0107-C2AS	08A-107-C2	9/22/2008 11:07	0	0.5			1	1		1	1		1	1	1		1		1	1		1	1	1	1	1		1			
108	08A-0108-C1AS	08A-108-C1	9/23/2008 9:27	0	0.5			1				1								1			1	1	1	1						
	08A-0108-C1BS	08A-108-C1	9/23/2008 9:27	0.5	1.3							1						1		1			1	1	1	1					1	
	08A-0108-C2AS	08A-108-C2	9/23/2008 9:47	0	0.5				1		1							1			1						1					
	08A-0108-C2BS	08A-108-C2	9/23/2008 9:47	0.5	1.5				1		1			1	1	1			1		1						1		1			
	08A-0108-G1AS	08A-108-G1	9/23/2008 10:15	0	0.1			1					1																			
	08A-0108-G2AS	08A-108-G2	9/23/2008 10:25	0	0.5					1				1	1	1												1	1		1	
109	08A-0109-C2AS	08A-109-C2	8/21/2008 11:13	0	0.5				1		1			1	1	1					1								1			
	08A-0109-C2BS	08A-109-C2	8/21/2008 11:13	0.5	1.5				1		1			1	1	1			1		1								1			
	08A-0109-C2DS	08A-109-C2	8/21/2008 11:13	2.5	3.5									1	1				1										1			
	08A-0109-C3AS	08A-109-C3	8/21/2008 11:37	0	0.5			1				1						1		1			1	1	1	1	1					
	08A-0109-C3BS	08A-109-C3	8/21/2008 11:37	0.5	1.5							1						1		1			1	1	1	1	1					
	08A-0109-C3CS	08A-109-C3	8/21/2008 11:37	1.5	2.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1			
	08A-0109-C3DS	08A-109-C3	8/21/2008 11:37	2.5	3.5				1		1	1				1		1	1	1	1		1	1	1	1	1				1	
	08A-0109-C3ES	08A-109-C3	8/21/2008 11:37	3.5	6.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1			
	08A-0109-C3FS	08A-109-C3	8/21/2008 11:37	6.5	7.58						1					1					1	1				1		1		1		1
	08A-0109-G5AS	08A-109-G5	8/21/2008 12:30	0	0.1			1					1																			

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0109-G7AS	08A-109-G7	8/21/2008 12:50	0	0.5					1																		1			1
110	08A-0110-C1AS	08A-110-C1	8/25/2008 13:30	0	0.5			1				1						1		1			1	1	1	1					
	08A-0110-C1BS	08A-110-C1	8/25/2008 13:30	0.5	1.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0110-C1CS	08A-110-C1	8/25/2008 13:30	1.5	2.5							1						1		1			1	1	1	1	1				
	08A-0110-C1DS	08A-110-C1	8/25/2008 13:30	2.5	3.5							1						1		1			1	1	1	1				1	
	08A-0110-C1ES	08A-110-C1	8/25/2008 13:30	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0110-C1FS	08A-110-C1	8/25/2008 13:30	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0110-C1GS	08A-110-C1	8/25/2008 13:30	7.5	9.37				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		1
	08A-0110-C2AS	08A-110-C2	8/25/2008 13:55	0	0.5				1		1			1	1	1					1						1		1		
	08A-0110-C2BS	08A-110-C2	8/25/2008 13:55	0.5	1.5									1	1	1													1		
	08A-0110-C2CS	08A-110-C2	8/25/2008 13:55	1.5	2.5				1		1			1	1	1				1		1							1		
08A-0110-C2DS	08A-110-C2	8/25/2008 13:55	2.5	3.5				1		1			1	1	1				1		1					1		1			
	08A-0110-G1AS	08A-110-G1	8/25/2008 14:05	0	0.1			1					1																		
	08A-0110-G2AS	08A-110-G2	8/25/2008 14:20	0	0.5					1																		1			1
111	08A-0111-C1AS	08A-111-C1	9/15/2008 11:16	0	0.5			1				1											1	1	1	1					
	08A-0111-C1BS	08A-111-C1	9/15/2008 11:16	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0111-C1CS	08A-111-C1	9/15/2008 11:16	1.5	2.5							1						1					1	1	1	1					
	08A-0111-C1DS	08A-111-C1	9/15/2008 11:16	2.5	3							1														1					
	08A-0111-C1ES	08A-111-C1	9/15/2008 11:16	3	5						1				1					1	1				1		1		1		1
	08A-0111-C2AS	08A-111-C2	9/15/2008 11:55	0	0.5											1		1		1							1		1		
	08A-0111-C2BS	08A-111-C2	9/15/2008 11:55	0.5	1.5				1		1			1	1				1		1							1		1	
	08A-0111-C2CS	08A-111-C2	9/15/2008 11:55	1.5	2.6				1		1			1	1	1		1	1	1	1						1		1		
	08A-0111-C3AS	08A-111-C3	9/15/2008 12:31	0	0.5				1		1			1	1							1									
	08A-0111-G1AS	08A-111-G1	9/15/2008 13:08	0	0.5			1					1																		
	08A-0111-G3AS	08A-111-G3	9/15/2008 13:13	0	0.5					1																		1			
	08A-0111-G4AS	08A-111-G4	9/15/2008 13:30	0	0.5																										1
112	08A-0112-C1AS	08A-112-C1	9/16/2008 8:59	0	0.5									1	1														1		
	08A-0112-C2AS	08A-112-C2	9/16/2008 9:23	0	0.5			1				1						1					1	1	1	1					
	08A-0112-C2BS	08A-112-C2	9/16/2008 9:23	0.5	1.5							1											1	1	1	1					
	08A-0112-C2CS	08A-112-C2	9/16/2008 9:23	1.5	2.5							1											1	1	1	1					
	08A-0112-C2DS	08A-112-C2	9/16/2008 9:23	2.5	3.5							1						1		1			1	1	1	1					1
	08A-0112-C3AS	08A-112-C3	9/16/2008 9:45	0	0.5				1		1						1			1	1						1				
	08A-0112-C3BS	08A-112-C3	9/16/2008 9:45	0.5	1.5				1		1			1	1	1		1	1	1	1						1		1		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0112-C3CS	08A-112-C3	9/16/2008 9:45	1.5	2.5				1		1			1	1	1		1	1	1	1						1		1		
	08A-0112-C3DS	08A-112-C3	9/16/2008 9:45	2.5	3.5				1		1			1	1	1		1	1	1	1						1		1		
	08A-0112-G3AS	08A-112-G3	9/16/2008 10:27	0	0.1			1					1																		
	08A-0112-G4AS	08A-112-G4	9/16/2008 10:43	0	0.5					1																	1				1
113	08A-0113-C1AS	08A-113-C1	9/17/2008 9:47	0	0.5			1				1						1		1			1	1	1	1	1				
	08A-0113-C1BS	08A-113-C1	9/17/2008 9:47	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0113-C1CS	08A-113-C1	9/17/2008 9:47	1.5	2.05							1												1	1	1					1
	08A-0113-C3AS	08A-113-C3	9/17/2008 10:13	0	0.5				1		1					1					1								1		
	08A-0113-C3BS	08A-113-C3	9/17/2008 10:13	0.5	1.5				1		1			1	1				1		1								1		
	08A-0113-C3CS	08A-113-C3	9/17/2008 10:13	1.5	2.5				1		1							1	1	1	1		1				1				
	08A-0113-C5AS	08A-113-C5	9/17/2008 12:16	0	0.5									1	1																
	08A-0113-C5CS	08A-113-C5	9/17/2008 12:16	1.5	2.5									1	1	1													1		
	08A-0113-G1AS	08A-113-G1	9/17/2008 11:18	0	0.1			1					1																		
	08A-0113-G2AS	08A-113-G2	9/17/2008 11:40	0	0.5					1																		1			1
114	08A-0114-C1AS	08A-114-C1	9/18/2008 11:45	0	0.5				1		1									1	1										
	08A-0114-C1BS	08A-114-C1	9/18/2008 11:45	0.5	1.5				1		1			1	1				1		1								1		
	08A-0114-C1CS	08A-114-C1	9/18/2008 11:45	1.5	2.5									1	1	1													1		
	08A-0114-C1DS	08A-114-C1	9/18/2008 11:45	2.5	3.5				1		1			1	1	1			1		1						1		1		
	08A-0114-C1ES	08A-114-C1	9/18/2008 11:45	3.5	5.5									1	1	1													1		
	08A-0114-C1FS	08A-114-C1	9/18/2008 11:45	5.5	6.5				1		1			1	1				1		1								1		
	08A-0114-C2AS	08A-114-C2	9/18/2008 12:20	0	0.5			1				1						1					1	1	1	1					
	08A-0114-C2BS	08A-114-C2	9/18/2008 12:20	0.5	1.5							1				1		1	1	1			1	1	1	1	1				
	08A-0114-C2CS	08A-114-C2	9/18/2008 12:20	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0114-C2DS	08A-114-C2	9/18/2008 12:20	2.5	3.5							1						1		1			1	1	1	1					1
	08A-0114-C2ES	08A-114-C2	9/18/2008 12:20	3.5	5.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0114-C2FS	08A-114-C2	9/18/2008 12:20	5.5	6.65							1				1		1		1			1	1	1	1	1				1
	08A-0114-C3AS	08A-114-C3	9/18/2008 12:49	0	0.5									1	1	1											1		1		
	08A-0114-G1AS	08A-114-G1	9/18/2008 13:25	0	0.1			1					1																		
	08A-0114-G4AS	08A-114-G4	9/18/2008 13:39	0	0.5					1																		1			1
115	08A-0115-C1AS	08A-115-C1	10/27/2008 11:01	0	0.5			1				1				1		1		1			1	1	1	1	1				
	08A-0115-C1BS	08A-115-C1	10/27/2008 11:01	0.5	1.5							1				1		1		1			1	1	1	1	1				
	08A-0115-C1CS	08A-115-C1	10/27/2008 11:01	1.5	2.5				1		1	1						1	1	1	1		1	1	1	1	1				
	08A-0115-C1DS	08A-115-C1	10/27/2008 11:01	2.5	3.5							1						1		1			1	1	1	1					1

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	Start Depth (feet)	End Depth (feet)	AVS/SEM	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Be-7	Butyltins	Copper/Nickel	Cyanide/Total Organic Carbon	PCDD/ PCDF	Equilibrium Potential	Geotechnical	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB congeners	Polynuclear Aromatic Hydrocarbons	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeable	Volatile Organics
	08A-0115-C1ES	08A-115-C1	10/27/2008 11:01	3.5	5.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0115-C1FS	08A-115-C1	10/27/2008 11:01	5.5	7.5				1		1	1		1	1	1		1	1	1	1		1	1	1	1	1		1		
	08A-0115-C1GS	08A-115-C1	10/27/2008 11:01	7.5	7.91						1				1					1	1				1		1		1		1
	08A-0115-C2AS	08A-115-C2	10/27/2008 11:41	0	0.5				1		1			1	1						1								1		
	08A-0115-C2BS	08A-115-C2	10/27/2008 11:41	0.5	1.5				1		1			1	1				1		1								1		
	08A-0115-C2CS	08A-115-C2	10/27/2008 11:41	1.5	2.5									1	1	1													1		
	08A-0115-C2DS	08A-115-C2	10/27/2008 11:41	2.5	3.5				1		1			1	1	1			1		1						1		1		
	08A-0115-G1AS	08A-115-G1	10/27/2008 12:02	0	0.1			1																							
	08A-0115-G1BS	08A-115-G1	10/27/2008 12:02	0.1	0.5								1																		
	08A-0115-G2AS	08A-115-G2	10/27/2008 12:13	0	0.5					1																		1			1
115D	08A-0115-D1AS	08A-0115-D1	12/8/2008 12:59	0	0.07						1	1			1	1		1		1	1			1	1		1				
	08A-0115-D1BS	08A-0115-D1	12/8/2008 12:59	0.07	0.16						1	1			1	1		1		1	1			1	1		1				
	08A-0115-D1CS	08A-0115-D1	12/8/2008 12:59	0.16	0.33						1	1			1	1		1		1	1			1	1		1				
	08A-0115-D1DS	08A-0115-D1	12/8/2008 12:59	0.33	0.98						1	1			1	1		1		1	1			1	1		1				
	08A-0115-D1ES	08A-0115-D1	12/8/2008 12:59	0.98	1.97						1	1			1	1		1		1	1			1	1		1				
116	08A-0116-G5AS	08A-116-G5	12/15/2008 14:21	0	0.5																										1
118	08A-0118-C1AS	08A-118-C1	12/16/2008 9:52	0	0.5			1																		1					
	08A-0118-C1BS	08A-118-C1	12/16/2008 9:52	0.5	1.5							1											1	1	1	1					
	08A-0118-C1CS	08A-118-C1	12/16/2008 9:52	1.5	2.5																				1						
	08A-0118-C1DS	08A-118-C1	12/16/2008 9:52	2.5	3.5						1				1					1	1				1		1		1		1
	08A-0118-C2AS	08A-118-C2	12/16/2008 10:05	0	0.5									1	1																
	08A-0118-C2BS	08A-118-C2	12/16/2008 10:05	0.5	1.5																										
	08A-0118-C2CS	08A-118-C2	12/16/2008 10:05	1.5	1.75											1													1		
	08A-0118-C5AS	08A-118-C5	12/16/2008 10:50	0	0.5							1						1		1			1	1	1		1				
	08A-0118-C5BS	08A-118-C5	12/16/2008 10:50	0.5	1.5				1		1							1	1	1	1						1				
	08A-0118-C5CS	08A-118-C5	12/16/2008 10:50	1.5	2.5							1						1		1			1	1	1						
	08A-0118-C6AS	08A-118-C6	12/16/2008 11:06	0	0.5				1		1					1					1								1		
	08A-0118-C6BS	08A-118-C6	12/16/2008 11:06	0.5	1.5									1	1	1													1		
	08A-0118-C6CS	08A-118-C6	12/16/2008 11:06	1.5	2				1		1			1	1						1						1				
	08A-0118-G1AS	08A-118-G1	12/16/2008 11:06	0.1	0.5			1					1																		
Sediment Sample Totals						10	10	200	657	87	729	704	91	655	733	692	10	704	443	739	729	10	663	707	738	664	735	87	684	10	275

Table D-2

QC Sample Summary Table

Table D-2
QC Sample Summary Table

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	AVS/SEM	Be-7	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Butyltins	Copper/ Nickel	Cyanide/Total Organic Carbon	Equilibrium Partitioning	Geotechnical Parameters	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB Congeners	Polynuclear Aromatic Hydrocarbons	PCDD/PCDF	Radionuclides	Semivolatle Organics	Sulfide	TPH extractables	TPH purgeables	Volatile Organics		
Equipment Blanks																															
	08A-0048-G2AR		7/31/2008 16:35				1	1	1				1		1		1	1		1	1	1	1			1		1		1	
	08A-0048-C3XR		7/31/2008 16:40				1		1				1		1		1	1		1	1	1	1			1		1		1	
	08A-0048-C3ER		7/31/2008 18:20				1		1				1		1		1	1		1	1	1	1			1		1		1	
	08A-0067-C3FR		8/6/2008 8:00			1	1		1				1	1	1	1	1	1	1	1	1	1	1			1	1	1		1	
	08A-0055-G8AR		8/7/2008 15:45			1		1						1					1								1		1	1	
	08A-0055-C3XR		8/7/2008 16:25				1		1				1		1	1	1	1	1	1	1	1	1			1	1	1	1	1	
	08A-0059-C2DR		8/12/2008 10:00				1		1				1		1	1	1	1	1	1	1	1	1			1	1	1	1	1	
	08A-0059-C5DR		8/12/2008 16:00											1																	
	08A-0062-G2AR		8/13/2008 13:43					1						1						1							1		1	1	
	08A-0062-C2XR		8/13/2008 14:10				1		1				1		1	1	1	1	1	1	1	1	1			1	1	1		1	
	08A-0043-C4DR		8/20/2008 8:15			1	1		1				1		1	1	1	1		1	1	1	1			1	1	1		1	
	08A-0046-C2AR		8/20/2008 17:15											1																	
	08A-0109-G2AR		8/21/2008 15:15					1						1						1							1		1	1	
	08A-0109-C3XR		8/21/2008 15:40			1	1		1				1	1	1	1	1	1	1	1	1	1	1			1	1	1	1	1	
	08A-0064-G10AR		8/25/2008 10:50																											1	
	08A-0064-C3XR		8/25/2008 10:55				1		1				1		1	1	1	1		1	1	1	1			1	1	1		1	
	08A-0052-C3AR		8/27/2008 10:15				1		1				1		1	1	1	1		1	1	1	1			1	1	1		1	
	08A-0061-C2XR		9/3/2008 15:15				1		1				1		1	1	1	1		1	1	1	1			1	1	1		1	
	08A-0061-G6AR		9/3/2008 15:35																											1	
	08A-0061-C2FR		9/4/2008 9:40				1		1				1		1	1	1	1		1	1	1	1			1	1	1		1	
	08A-0068-C2FR		9/4/2008 9:40				1		1				1		1	1	1	1		1	1	1	1			1		1		1	
	08A-0077-C5CR		9/9/2008 9:30				1		1				1		1	1	1	1		1	1	1	1			1	1	1		1	
	08A-0090-C5XR		9/11/2008 15:25				1		1				1		1		1	1		1	1	1	1			1	1	1		1	
	08A-0090-G6AR		9/11/2008 15:45					1																			1			1	
	08A-0090-C5BR		9/15/2008 12:45												1						1	1				1					
	08A-0090-C1BR		9/15/2008 11:00			1	1		1				1			1	1	1		1			1			1	1	1	1	1	
	08A-0090-C1AR		9/15/2008 14:45											1									1								
	08A-0112-C3XR		9/16/2008 15:01				1		1				1		1	1	1	1		1	1	1	1			1		1		1	
	08A-0112-G4AR		9/16/2008 15:34					1												1							1			1	
085	08A-0085-G1AR		9/18/2008 14:05					1																				1		1	
	08A-0085-C5XR		9/18/2008 14:20			1	1		1				1		1	1	1	1		1	1	1	1			1	1	1		1	
	08A-0107-C2AR		9/23/2008 9:10			1	1		1						1	1	1	1					1				1		1	1	
	08A-0035-C6AR		9/23/2008 16:30											1																	
	08A-0035-C5BR		9/24/2008 8:40										1							1	1	1				1		1			
	08A-0040-C3XR		9/24/2008 15:46			1	1		1				1		1	1	1	1		1	1	1	1			1	1	1		1	
	08A-0040-G7AR		9/24/2008 16:10					1																			1			1	
	08A-0092-C3AR		9/29/2008 11:30			1	1		1				1		1	1	1	1		1	1	1	1			1	1	1		1	
091	08A-0091-C4XR		9/25/2008 15:35				1		1				1		1	1	1	1		1	1	1	1			1		1		1	
	08A-0091-G6AR		9/25/2008 16:00					1																			1			1	
	08A-0103-C1FR		9/30/2008 15:30											1																	
	08A-0101-C2XR		10/2/2008 10:35			1	1		1				1		1	1	1	1		1	1	1	1			1		1		1	
	08A-0101-G2AR		10/2/2008 12:15					1						1						1							1		1	1	
	08A-0033-C2XR		10/22/2008 13:40			1	1		1				1		1	1	1	1		1	1	1	1			1		1		1	

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	AVS/SEM	Be-7	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Butyltins	Copper/ Nickel	Cyanide/Total Organic Carbon	Equilibrium Partitioning	Geotechnical Parameters	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB Congeners	Polynuclear Aromatic Hydrocarbons	PCDD/PCDF	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeables	Volatile Organics
	08A-0033-G2AR		10/22/2008 14:05			1	1		1				1	1	1	1	1	1	1	1	1	1	1		1		1	1	1
	08A-0033-C1FR		10/22/2008 18:00			1	1		1				1		1	1	1	1		1	1	1	1		1	1	1		1
	08A-0033-C2DR		10/23/2008 13:00														1	1		1		1			1		1		1
	08A-0026-C2DR		10/28/2008 15:30			1	1		1				1		1	1	1	1		1	1	1	1		1	1	1		1
	08A-0024-G3AR		10/30/2008 11:20			1		1						1					1							1		1	1
	08A-0024-C2XR		10/30/2008 11:40				1		1				1		1	1	1	1		1	1	1	1		1	1	1		1
	08A-0020-C4DR		11/5/2008 9:30			1	1		1				1		1	1	1	1		1	1	1	1		1	1	1		1
	08A-0021-G5AR		11/6/2008 11:00			1		1						1					1							1		1	1
	08A-0021-C2XR		11/6/2008 11:30			1	1		1				1		1	1	1	1		1	1	1	1		1		1		1
	08A-0005-G2AR		11/12/2008 13:55					1																		1			1
	08A-0005-C2XR		11/12/2008 14:15				1		1				1		1	1	1	1		1	1	1	1		1		1		1
	08A-0005-C1IR		11/13/2008 9:15			1	1		1				1		1	1	1	1		1	1	1	1		1	1	1		1
	08A-0013-C1GR		11/18/2008 9:00			1	1		1				1		1	1	1	1		1	1	1	1		1	1	1		1
	08A-0007-G3AR		11/19/2008 14:30					1						1					1		1	1	1			1		1	1
	08A-0007-C2XR		11/19/2008 14:40			1	1		1				1		1	1	1	1		1	1	1	1		1		1		1
	08A-0001-C2FR		11/24/2008 9:15				1		1				1		1	1	1	1		1	1	1	1		1	1	1		1
	08A-0004-G2AR		11/25/2008 10:30					1																		1			1
	08A-0004-C2XR		11/25/2008 10:45				1		1				1		1	1	1	1		1	1	1	1		1		1		1
	08A-0017-G2AR		12/2/2008 11:40					1																		1			1
	08A-0017-C3XR		12/2/2008 11:55				1		1				1		1	1	1	1		1	1	1	1		1		1		1
	08A-0014-C2FR		12/4/2008 7:59				1		1				1		1	1	1	1		1	1	1	1		1	1	1		1
	08A-0010-C1FR		12/9/2008 9:30			1	1		1				1		1	1	1	1		1	1	1	1		1	1	1		1
	08A-0082-C2XR		12/10/2008 13:30				1		1				1		1	1	1	1		1	1	1	1		1		1		1
	08A-0082-G3AR		12/10/2008 14:30			1		1						1					1							1		1	1
	08A-0118-C2FR		12/16/2008 17:30				1		1				1		1	1	1	1		1	1	1	1		1	1	1		1
	08A-0118-C6XR		12/16/2008 13:58				1		1				1		1	1	1	1		1	1	1	1		1	1	1		1
	08A-0118-G7AR		12/16/2008 13:58					1																		1			1
Equipment Blank Totals				0	0	23	42	18	42	0	0	0	42	16	42	39	43	43	15	43	42	42	42	0	43	45	43	14	63

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/ Time	AVS/SEM	Be-7	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Butyltins	Copper/ Nickel	Cyanide/Total Organic Carbon	Equilibrium Partitioning	Geotechnical Parameters	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB Congeners	Polynuclear Aromatic Hydrocarbons	PCDD/PCDF	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeables	Volatile Organics
---------------------	-----------------------	---------------------	----------------------	---------	------	--	-----------	----------------	------------------------------	--------------------------	-------------------------	------------	------------	---------------------	------------------------	----------------------	---------	--------	----------------	--------------	---------------	-----------------------------------	-----------	---------------	-----------------------	---------	------------------	----------------	-------------------

Field Duplicates																																		
057	08A-0057-C1FT	08A-057-C1	8/4/2008 8:38											1			1			1	1	1	1	1	1									
	08A-0057-C2FT	08A-057-C2	8/4/2008 9:40				1			1				1							1	1	1	1	1	1			1					
058	08A-0058-C1CT	08A-058-C1	8/11/2008 8:01																		1	1	1	1						1				
	08A-0058-C2CT	08A-058-C2	8/11/2008 9:06											1			1				1													
	08A-0058-C3CT	08A-058-C3	8/11/2008 9:28				1			1							1													1		1		
043	08A-0043-C2ET	08A-043-C2	8/19/2008 8:16							1										1	1							1		1			1	
045	08A-0045-C1FT	08A-045-C1	8/20/2008 8:04																											1				
	08A-0045-C2DT	08A-045-C2	8/20/2008 8:47																														1	
	08A-0045-C2FT	08A-045-C2	8/20/2008 8:47							1				1		1	1	1	1		1	1	1	1	1	1	1							
066	08A-0066-C1AT	08A-066-C1	8/21/2008 7:24		1												1			1	1	1	1	1	1									
	08A-0066-G1AT	08A-066-G1	8/21/2008 8:42		1																													
	08A-0066-C2AT	08A-066-C2	8/21/2008 9:17							1																			1		1			
109	08A-0109-C3ET	08A-109-C3	8/21/2008 11:37				1			1				1		1	1	1	1		1	1	1	1	1	1	1	1		1				
	08A-0109-G7AT	08A-109-G7	8/21/2008 12:50																											1				
064	08A-0064-C1BT	08A-064-C1	8/25/2008 7:24														1				1	1	1	1	1	1								
	08A-0064-C2BT	08A-064-C2	8/25/2008 7:54							1						1		1										1		1				
051	08A-0051-G2AT	08A-051-G2	8/26/2008 10:15																											1				
054	08A-0054-C3BT	08A-054-C3	8/27/2008 10:40																															
	08A-0054-C3DT	08A-054-C3	8/27/2008 10:40																															
	08A-0054-C1BT	08A-054-C1	8/27/2008 9:52																															
056	08A-0056-C2CT	08A-056-C2	8/27/2008 13:22																															
	08A-0056-C2DT	08A-056-C2	8/27/2008 13:22																															1
	08A-0056-C2HT	08A-056-C2	8/27/2008 13:22																															
065	08A-0065-C1CT	08A-065-C1	8/28/2008 8:02																															
	08A-0065-C3ET	08A-065-C3	8/28/2008 9:14							1				1		1	1	1	1		1	1	1	1	1	1	1		1					
	08A-0065-G1AT	08A-065-G1	8/28/2008 9:48		1																													
	08A-0065-G2AT	08A-065-G2	8/28/2008 9:55																															1
068	08A-0068-C1BT	08A-068-C1	9/4/2008 7:55																															
	08A-0068-C1DT	08A-068-C1	9/4/2008 7:55																															1
	08A-0068-C1ET	08A-068-C1	9/4/2008 7:55														1			1	1	1	1	1	1	1								
	08A-0068-C2ET	08A-068-C2	9/4/2008 8:37				1			1				1			1														1			
069	08A-0069-C1FT	08A-069-C1	9/4/2008 11:00																															
	08A-0069-C2CT	08A-069-C2	9/4/2008 11:40																															
	08A-0069-G1AT	08A-069-G1	9/4/2008 12:35		1																													
	08A-0069-G3AT	08A-069-G3	9/4/2008 12:55																															1
077	08A-0077-C5CT	08A-077-C5	9/8/2008 15:34																															
079	08A-0079-C4BT	08A-079-C4	9/9/2008 14:35																															
	08A-0079-C4DT	08A-079-C4	9/9/2008 14:35																															
080	08A-0080-C1CT	08A-080-C1	9/10/2008 7:17																															
	08A-0080-C1DT	08A-080-C1	9/10/2008 7:17																															
081	08A-0081-C3DT	08A-081-C3	9/10/2008 14:03																															
111	08A-0111-C1ET	08A-111-C1	9/15/2008 11:16																															
	086	08A-0086-C1BT	08A-086-C1	9/16/2008 7:41																														
		08A-0086-C3BT	08A-086-C3	9/16/2008 8:37																														
		08A-0086-C5BT	08A-086-C5	9/16/2008 11:32																													1	
087	08A-0087-C3AT	08A-087-C3	9/16/2008 12:39																															

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	AVS/SEM	Be-7	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Butyltins	Copper/ Nickel	Cyanide/Total Organic Carbon	Equilibrium Partitioning	Geotechnical Parameters	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB Congeners	Polynuclear Aromatic Hydrocarbons	PCDD/PCDF	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeables	Volatile Organics
088	08A-0088-C1AT	08A-088-C1	9/17/2008 7:50		1																			1					
114	08A-0114-C1BT	08A-114-C1	9/18/2008 11:45				1		1							1		1											
	08A-0114-C1CT	08A-114-C1	9/18/2008 11:45										1														1		
041	08A-0041-C1DT	08A-041-C1	9/22/2008 8:52														1			1	1	1	1	1					
	08A-0041-C2CT	08A-041-C2	9/22/2008 9:29								1	1															1		
	08A-0041-C2DT	08A-041-C2	9/22/2008 9:29				1		1						1	1		1								1			
042	08A-0042-C2DT	08A-042-C2	9/22/2008 11:25																										1
108	08A-0108-C1BT	08A-108-C1	9/23/2008 9:27														1												
035	08A-0035-C5AT	08A-035-C5	9/23/2008 10:30														1												
019	08A-0019-C1ET	08A-019-C1	9/24/2008 8:20								1	1																	
040	08A-0040-C1CT	08A-040-C1	9/24/2008 12:22												1		1			1	1	1	1	1					
	08A-0040-C1ET	08A-040-C1	9/24/2008 12:22												1		1			1	1	1	1	1					1
	08A-0040-C3CT	08A-040-C3	9/24/2008 13:20				1		1									1											
092	08A-0092-C1BT	08A-092-C1	9/25/2008 9:44						1			1					1	1								1			
	08A-0092-C4AT	08A-092-C4	9/25/2008 10:55														1												
104	08A-0104-C1FT	08A-104-C1	9/29/2008 11:26				1		1		1	1	1		1	1	1	1		1	1	1	1	1	1		1		
103	08A-0103-C1BT	08A-103-C1	9/30/2008 8:54										1														1		
	08A-0103-C1FT	08A-103-C1	9/30/2008 8:54												1											1			
	08A-0103-C2DT	08A-103-C2	9/30/2008 9:44														1												
	08A-0103-C2BT	08A-103-C2	9/30/2008 9:45														1												
100	08A-0100-C2BT	08A-100-C2	9/30/2008 12:10								1	1																	
099	08A-0099-C1CT	08A-099-C1	10/1/2008 10:34														1												
	08A-0099-C1ET	08A-099-C1	10/1/2008 10:34														1												
	08A-0099-C1FT	08A-099-C1	10/1/2008 10:34								1	1														1			
101	08A-0101-C1ET	08A-101-C1	10/2/2008 8:15				1		1							1		1											
	08A-0101-C1FT	08A-101-C1	10/2/2008 8:15										1								1								
039	08A-0039-C2CT	08A-039-C2	10/20/2008 15:19								1	1																	
036	08A-0036-C1ET	08A-036-C1	10/21/2008 11:55				1		1		1	1				1		1									1		
	08A-0036-C2ET	08A-036-C2	10/21/2008 12:46										1		1		1			1	1	1	1	1	1				
033	08A-0033-C1BT	08A-033-C1	10/22/2008 10:46														1												
	08A-0033-C1ET	08A-033-C1	10/22/2008 10:46												1		1			1	1	1	1	1					
	08A-0033-C1FT	08A-033-C1	10/22/2008 10:46						1			1					1	1		1	1	1	1	1		1		1	
	08A-0033-G1AT	08A-033-G1	10/22/2008 11:58		1																								
	08A-0033-G2AT	08A-033-G2	10/22/2008 12:10																										1
031	08A-0031-C2CT	08A-031-C2	10/23/2008 9:43										1														1		
032	08A-0032-C2CT	08A-032-C2	10/23/2008 11:22														1												
	08A-0032-C2HT	08A-032-C2	10/23/2008 11:22														1												
030	08A-0030-C1FT	08A-030-C1	10/27/2008 8:57																					1					
	08A-0030-C2BT	08A-030-C2	10/27/2008 9:44																								1		
	08A-0030-G2AT	08A-030-G2	10/27/2008 10:12																							1			
115	08A-0115-C1CT	08A-115-C1	10/27/2008 11:01																				1						
	08A-0115-C1ET	08A-115-C1	10/27/2008 11:01				1		1				1			1		1											
	08A-0115-C1FT	08A-115-C1	10/27/2008 11:01												1														
	08A-0115-C2CT	08A-115-C2	10/27/2008 11:41										1																
026	08A-0026-C1BT	08A-026-C1	10/28/2008 8:29												1		1												
	08A-0026-C1DT	08A-026-C1	10/28/2008 8:29														1												
	08A-0026-C1ET	08A-026-C1	10/28/2008 8:29				1		1						1			1		1	1	1			1		1		1
	08A-0026-G1AT	08A-026-G1	10/29/2008 12:36		1																								

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	AVS/SEM	Be-7	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Butyltins	Copper/ Nickel	Cyanide/Total Organic Carbon	Equilibrium Partitioning	Geotechnical Parameters	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB Congeners	Polynuclear Aromatic Hydrocarbons	PCDD/PCDF	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeables	Volatile Organics
	08A-0026-G2AT	08A-026-G2	10/29/2008 12:45	1										1					1									1	1
029	08A-0029-C1AT	08A-029-C1	10/29/2008 8:30		1														1		1	1	1	1					
	08A-0029-C1CT	08A-029-C1	10/29/2008 8:30														1				1	1	1	1					
	08A-0029-C2AT	08A-029-C2	10/29/2008 9:09										1		1		1			1					1				
	08A-0029-C2CT	08A-029-C2	10/29/2008 9:09										1		1					1					1		1		
	08A-0029-C3AT	08A-029-C3	10/29/2008 9:30				1		1									1									1		
	08A-0029-C3CT	08A-029-C3	10/29/2008 9:30				1		1		1	1				1		1									1		
	08A-0029-G2AT	08A-029-G2	10/29/2008 10:05								1	1																	
027	08A-0027-C1FT	08A-027-C1	10/29/2008 10:50														1												
024	08A-0024-C1FT	08A-024-C1	10/30/2008 8:26										1		1		1			1	1	1	1	1	1		1		
	08A-0024-C2FT	08A-024-C2	10/30/2008 9:09				1		1		1	1				1		1											
025	08A-0025-C1ET	08A-025-C1	11/3/2008 8:09																		1	1	1	1					
022	08A-0022-C1GT	08A-022-C1	11/3/2008 10:18														1												
020	08A-0020-C2BT	08A-020-C2	11/4/2008 7:38												1		1			1	1	1	1	1					
	08A-0020-C2FT	08A-020-C2	11/4/2008 7:38				1		1				1		1	1	1	1		1	1	1	1	1	1				
	08A-0020-C3BT	08A-020-C3	11/4/2008 8:15				1		1				1			1		1							1				
	08A-0020-C3FT	08A-020-C3	11/4/2008 8:15								1	1															1		
	08A-0020-C4BT	08A-020-C4	11/4/2008 8:42								1	1															1		
028	08A-0028-C1BT	08A-028-C1	11/5/2008 7:30																						1				
	08A-0028-C2DT	08A-028-C2	11/5/2008 8:10																										1
	08A-0028-G2AT	08A-028-G2	11/5/2008 8:44																							1			
021	08A-0021-C1AT	08A-021-C1	11/6/2008 7:12		1																								
	08A-0021-C1FT	08A-021-C1	11/6/2008 7:12				1		1				1		1	1	1	1		1	1	1	1	1	1				
	08A-0021-C2FT	08A-021-C2	11/6/2008 8:02								1	1															1		
	08A-0021-G4AT	08A-021-G4	11/6/2008 8:44																1										
018	08A-0018-C1CT	08A-018-C1	11/10/2008 7:16														1												
003	08A-0003-C1FT	08A-003-C1	11/11/2008 9:50																						1				
	08A-0003-C1GT	08A-003-C1	11/11/2008 9:50																		1	1							
005	08A-0005-C1ET	08A-005-C1	11/12/2008 11:42														1												
	08A-0005-C1HT	08A-005-C1	11/12/2008 11:42																										1
011	08A-0011-C1ET	08A-011-C1	11/13/2008 7:11				1		1				1		1	1	1	1		1	1	1	1	1	1		1		
	08A-0011-C2ET	08A-011-C2	11/13/2008 8:08								1	1																	
013	08A-0013-C1GT	08A-013-C1	11/17/2008 7:36								1	1															1		
	08A-0013-C2AT	08A-013-C2	11/17/2008 8:25		1																								
	08A-0013-C2FT	08A-013-C2	11/17/2008 8:25				1		1		1	1	1				1			1			1			1			
	08A-0013-C2GT	08A-013-C2	11/17/2008 8:25				1		1				1		1	1	1	1		1	1	1	1	1	1				
006	08A-0006-C1AT	08A-006-C1	11/18/2008 8:15		1												1						1	1					
	08A-0006-C1CT	08A-006-C1	11/18/2008 8:15												1					1	1	1							
	08A-0006-C1ET	08A-006-C1	11/18/2008 8:15														1												
	08A-0006-C2AT	08A-006-C2	11/18/2008 9:29																						1				
	08A-0006-C2CT	08A-006-C2	11/18/2008 9:29				1		1				1					1											
	08A-0006-C3AT	08A-006-C3	11/18/2008 9:49																								1		
	08A-0006-C3CT	08A-006-C3	11/18/2008 9:49								1	1																	
	08A-0006-G2AT	08A-006-G2	11/18/2008 10:12					1																					
007	08A-0007-C2LT	08A-007-C2	11/19/2008 11:50																										1
	08A-0007-G3AT	08A-007-G3	11/19/2008 13:35					1																					
001	08A-0001-C1AT	08A-001-C1	11/20/2008 7:30		1																			1					
	08A-0001-C1BT	08A-001-C1	11/20/2008 7:30														1												

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	AVS/SEM	Be-7	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Butyltins	Copper/ Nickel	Cyanide/Total Organic Carbon	Equilibrium Partitioning	Geotechnical Parameters	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB Congeners	Polynuclear Aromatic Hydrocarbons	PCDD/PCDF	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeables	Volatile Organics
	08A-0001-C1CT	08A-001-C1	11/20/2008 7:30														1												
	08A-0001-C1FT	08A-001-C1	11/20/2008 7:30				1		1				1		1	1	1	1		1	1	1	1		1		1		
	08A-0001-C2FT	08A-001-C2	11/20/2008 8:41								1	1																	
	08A-0001-G3AT	08A-001-G3	11/20/2008 9:37					1																					
008	08A-0008-C1BT	08A-008-C1	11/24/2008 8:07														1												
	08A-0008-C1CT	08A-008-C1	11/24/2008 8:07														1												
	08A-0008-C1DT	08A-008-C1	11/24/2008 8:07																										1
	08A-0008-C1ET	08A-008-C1	11/24/2008 8:07										1		1		1			1	1	1	1	1	1		1		
	08A-0008-C2ET	08A-008-C2	11/24/2008 9:17				1		1		1	1				1		1											
004	08A-0004-C1CT	08A-004-C1	11/25/2008 7:57														1												
	08A-0004-C1FT	08A-004-C1	11/25/2008 7:57				1		1				1		1	1	1	1		1	1	1	1	1	1				
	08A-0004-C1HT	08A-004-C1	11/25/2008 7:57												1		1			1	1	1	1	1	1				
	08A-0004-C1KT	08A-004-C1	11/25/2008 7:57				1		1		1	1	1					1									1		
	08A-0004-C2FT	08A-004-C2	11/25/2008 8:56								1	1															1		
	08A-0004-G2AT	08A-004-G2	11/25/2008 9:33					1																					
016	08A-0016-C1ET	08A-0016-C1	12/1/2008 7:24												1		1			1	1	1	1	1	1				
	08A-0016-C1HT	08A-0016-C1	12/1/2008 7:24														1												
	08A-0016-C2ET	08A-0016-C2	12/1/2008 8:24				1		1		1	1	1			1		1									1		
017	08A-0017-C1AT	08A-017-C1	12/2/2008 7:26		1																	1	1	1	1				
	08A-0017-C1DT	08A-017-C1	12/2/2008 7:26																										1
	08A-0017-C1MT	08A-017-C1	12/2/2008 7:26														1												
	08A-0017-C2AT	08A-017-C2	12/2/2008 9:29										1				1								1		1		
	08A-0017-C3AT	08A-017-C3	12/2/2008 9:49				1		1						1			1		1									
014	08A-0017-G2AT	08A-017-G2	12/2/2008 10:11					1			1	1																	
	08A-0014-C1ET	08A-0014-C1	12/3/2008 7:50										1		1		1			1	1	1	1	1	1				
	08A-0014-C1MT	08A-0014-C1	12/3/2008 7:50														1												
	08A-0014-C2ET	08A-0014-C2	12/3/2008 9:40				1		1		1	1						1									1		
012	08A-0012-C1FT	08A-012-C1	12/4/2008 7:17				1		1						1	1	1	1		1	1	1	1	1	1				
	08A-0012-C2FT	08A-012-C2	12/4/2008 8:10								1	1	1														1		
010	08A-0010-C1ET	08A-010-C1	12/8/2008 7:47				1		1		1	1				1		1											
	08A-0010-G2AT	08A-010-G2	12/8/2008 8:53					1																					
	08A-0010-C2DT	08A-010-C2	12/8/2008 9:25																										1
	08A-0010-C2ET	08A-010-C2	12/8/2008 9:25										1		1		1			1	1	1	1	1	1		1		
	08A-0010-C2HT	08A-010-C2	12/8/2008 9:25														1												
028	08A-0028-D1DT	08A-0028-D1	12/8/2008 12:13						1			1	1		1		1	1			1	1	1	1		1			
084	08A-0084-C1BT	08A-0084-C1	12/9/2008 9:43												1		1			1	1	1	1	1	1				
	08A-0084-C2BT	08A-0084-C2	12/9/2008 10:30				1		1		1	1	1			1		1									1		
062	08A-0062-D1ET	08A-0062-D1	12/9/2008 15:20						1			1	1		1		1	1			1	1	1		1				
082	08A-0082-C1FT	08A-082-C1	12/10/2008 8:12								1	1																	
	08A-0082-C2FT	08A-082-C2	12/10/2008 8:40				1		1				1		1		1	1		1	1	1	1	1	1		1		
085	08A-0085-C1FT	08A-085-C1	12/11/2008 8:45				1		1						1	1	1	1		1	1	1	1	1	1				
	08A-0085-C2FT	08A-085-C2	12/11/2008 9:50								1	1	1							1	1	1	1	1			1		
118	08A-0118-C1BT	08A-118-C1	12/16/2008 9:52																	1	1	1	1	1					
	08A-0118-C2BT	08A-118-C2	12/16/2008 10:05								1	1																	
	08A-0118-C5BT	08A-118-C5	12/16/2008 10:50				1		1						1	1	1	1							1				
	08A-0118-C6BT	08A-118-C6	12/16/2008 11:06										1														1		
Field Duplicate Totals				1	13	0	40	6	46	0	39	45	42	1	43	30	80	45	2	39	43	45	42	40	46	4	42	1	17

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/ Time	AVS/SEM	Be-7	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Butyltins	Copper/ Nickel	Cyanide/Total Organic Carbon	Equilibrium Partitioning	Geotechnical Parameters	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB Congeners	Polynuclear Aromatic Hydrocarbons	PCDD/PCDF	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeables	Volatile Organics
---------------------	-----------------------	---------------------	----------------------	---------	------	--	-----------	----------------	------------------------------	--------------------------	-------------------------	------------	------------	---------------------	-------------------------	----------------------	---------	--------	----------------	--------------	---------------	-----------------------------------	-----------	---------------	-----------------------	---------	------------------	----------------	-------------------

Trip Blanks																															
	08A-0730-T1		7/30/2008 8:00																											1	
	08A-0731-T1		7/31/2008 8:00																											1	
	08A-0804-T1		8/4/2008 8:00																											1	
	08A-0805-T1		8/5/2008 8:00																											1	
	08A-0805-T2		8/5/2008 8:00																										1		
	08A-0806-T1		8/6/2008 8:00																											1	
	08A-0807-T1		8/7/2008 8:00																										1	1	
	08A-0811-T1		8/11/2008 8:00																											1	
	08A-0812-T1		8/12/2008 8:00																											1	
	08A-0813-T1		8/13/2008 7:34																											1	
	08A-0814-T1		8/14/2008 8:00																										1		
	08A-0814-T2		8/14/2008 8:00																											1	
	08A-0818-T1		8/18/2008 8:00																											1	
	08A-0819-T1		8/19/2008 8:00																											1	
	08A-0820-T1		8/20/2008 8:00																											1	
	08A-0820-T2		8/20/2008 8:00																										1		
	08A-0821-T1		8/21/2008 8:00																										1		
	08A-0825-T1		8/25/2008 8:00																											1	
	08A-0826-T1		8/26/2008 8:00																											1	
	08A-0827-TB1		8/27/2008 8:00																											1	
	08A-0828-T1		8/28/2008 8:00																											1	
	08A-0902-T1		9/2/2008 8:00																											1	
	08A-0903-T1		9/3/2008 8:00																											1	
	08A-0904-T1		9/4/2008 8:00																											1	
	08A-0908-T1		9/8/2008 0:00																											1	
	08A-0909-T1		9/9/2008 8:00																											1	
	08A-0910-T1		9/10/2008 8:00																											1	
	08A-0911-T1		9/11/2008 8:00																											1	
	08A-0915-T2		9/15/2008 9:00																											1	
	08A-0916-T1		9/16/2008 8:00																											1	
	08A-0916-T2		9/16/2008 8:00																											1	
	08A-0112-T2		9/16/2008 8:04																											1	
	08A-0917-T1		9/17/2008 8:00																											1	
	08A-0917-T3		9/17/2008 8:05																											1	
	08A-0918-T2		9/18/2008 8:00																											1	
	08A-0922-T1		9/22/2008 8:00																											1	
	08A-0923-T2		9/23/2008 8:00																											1	
	08A-0924-T1		9/24/2008 8:00																											1	
	08A-0924-T2		9/24/2008 8:00																											1	
	08A-0925-T1		9/25/2008 8:00																											1	
	08A-0929-T1		9/29/2008 8:00																											1	
	08A-0930-T1		9/30/2008 8:00																											1	
	08A-0930-T2		9/30/2008 8:00																										1		
	08A-1001-T1		10/1/2008 8:00																											1	
	08A-1002-T1		10/2/2008 8:00																											1	
	08A-1002-T2		10/2/2008 8:00																										1		

Station Location	Sample Interval ID	Sample Core/Grab	Sample Date/Time	AVS/SEM	Be-7	Ammonia/Phosphorus/Total Kjeldahl/Nitrogen	Butyltins	Copper/ Nickel	Cyanide/Total Organic Carbon	Equilibrium Partitioning	Geotechnical Parameters	Grain Size	Herbicides	Hexavalent Chromium	Pesticides by HRGC/HRMS	Pesticides by GC/ECD	Mercury	Metals	Methyl Mercury	PCB Aroclors	PCB Congeners	Polynuclear Aromatic Hydrocarbons	PCDD/PCDF	Radionuclides	Semivolatile Organics	Sulfide	TPH extractables	TPH purgeables	Volatile Organics		
	08A-1020-T1		10/20/2008 8:00																										1		
	08A-1021-T1		10/21/2008 8:00																										1		
	08A-1022-T1		10/22/2008 8:00																										1		
	08A-1022-T2		10/22/2008 8:00																									1			
	08A-1023-T1		10/23/2008 8:00																										1		
	08A-1027-T1		10/27/2008 8:00																										1		
	08A-1028-T1		10/28/2008 8:00																										1		
	08A-1029-T1		10/29/2008 8:00																										1		
	08A-1029-T2		10/29/2008 8:00																									1			
	08A-1030-T1		10/30/2008 8:00																										1		
	08A-1103-T1		11/3/2008 8:00																										1		
	08A-1104-T1		11/4/2008 8:00																										1		
	08A-1105-T1		11/5/2008 8:00																										1		
	08A-1106-T1		11/6/2008 8:00																										1		
	08A-1106-T2		11/6/2008 8:00																									1			
	08A-1110-T1		11/10/2008 8:00																										1		
	08A-1111-T1		11/11/2008 8:00																										1		
	08A-1112-T1		11/12/2008 8:00																										1		
	08A-1113-T1		11/13/2008 8:00																										1		
	08A-1117-T1		11/17/2008 8:00																										1		
	08A-1118-T1		11/18/2008 8:00																										1		
	08A-1119-T1		11/19/2008 8:00																										1		
	08A-1119-T2		11/19/2008 8:00																									1			
	08A-1120-T1		11/20/2008 8:00																										1		
	08A-1120-T2		11/20/2008 8:00																									1			
	08A-1124-T1		11/24/2008 8:00																										1		
	08A-1125-T1		11/25/2008 8:00																										1		
	08A-1202-T1		12/2/2008 8:00																										1		
	08A-1204-T1		12/4/2008 8:00																										1		
	08A-1205-T1		12/5/2008 8:00																										1		
	08A-1208-T1		12/8/2008 8:00																										1		
	08A-1209-T1		12/9/2008 8:00																										1		
	08A-1210-T1		12/10/2008 8:00																										1		
	08A-1210-T2		12/10/2008 8:00																										1		
	08A-1211-T1		12/11/2008 8:00																										1		
	08A-1215-T1		12/15/2008 8:00																										1		
Trip Blank Totals																														11	72

Appendix E

Probing Data

Appendix F

Tide Gage Data and Water Level Record

Appendix G

Sediment Core Collection Record

Cores are Sorted by Location ID

Abandoned Locations:

97 - Abandoned due to safety reasons (work immediately downstream of Dundee Dam), no cores attempted

102 - Abandoned due to shallow conditions (location now a sandbar) and safety concerns (utilities), no cores attempted

117 - Abandoned due to property owner not granting access (Dundee Canal location), no cores attempted

Appendix H

Hazardous and Non-hazardous Shipping Manifests and Analytical Data from Investigation Derived Waste

Appendix I

Daily Activity Logs

Missing ENSR Logs for:

August 7, 2008
September 19, 2008
September 23, 2008

Appendix J

Sediment Grab Collection Records

Grabs are Sorted by Location ID

Abandoned Locations:

53 - Abandoned after five coring attempts (three on-target, one upriver, one downriver); rocky substrate, penetration 0.5 feet

91 - Abandoned after four attempts with portable vibracore (three on-target, one downriver); rocky substrate and boulders, no penetration

93 - Abandoned after four attempts with portable vibracore (three on-target, one downriver); no penetration

94 - Abandoned after four attempts with portable vibracore (three on-target, one downriver); no penetration

95 - Abandoned after five attempts with push core (three on-target, one upriver, one downriver); cobbles and boulders, no penetration and no recovery

97 - Abandoned due to safety reasons (work immediately downstream of Dundee Dam), no cores attempted

102 - Abandoned due to shallow conditions (location now a sandbar) and safety concerns (utilities), no cores attempted

117 - Abandoned due to property owner not granting access (Dundee Canal location), no cores attempted

No Grab Form Recorded For:

72

87

90

106

Appendix K

Lithology Core Records

Appendix L

Core and Grab Photos – included on CD

The following are excluded:

CLRC-0040	No bowl photo - core only
CLRC-0052	No core photo - bowl only
CLRC-0053	Abandoned Location
CLRC-0055	No bowl photo - core only
CLRC-0065	No bowl photo - core only
CLRC-0082	No bowl photo - core only
CLRC-0091	Abandoned Location
CLRC-0093	Abandoned Location
CLRC-0094	Abandoned Location
CLRC-0095	Abandoned Location
CLRC-0096	No bowl photo - core only
CLRC-0097	Abandoned Location
CLRC-0102	Abandoned Location
CLRC-0106	No core photo - bowl only
CLRC-0107	No core photo - bowl only
CLRC-0116	No bowl photo - core only
CLRC-0117	Abandoned Location
CLRC-0118	No bowl photo - core only

Appendix M

Performance Evaluation Sample Results

AECOM Environment
2 Technology Park Drive, Westford, MA 01886
T 978.589.3000 F 978.589.3035 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
PURPOSES ONLY

Memorandum

Date: January 27, 2009
To: Deb Simmons
From: Mary Kozik
Subject: Summary of Results: Performance Evaluation Samples
Lower Passaic River Restoration Program

Distribution: Jenny Phillips Polly Newbold 12182-004-A104

Introduction

Performance Evaluation (PE) samples were used as part of the overall assessment of the laboratories selected for participation in the Lower Passaic River Restoration Program (LPRRP). Review of laboratory documentation (certification status, staff resumes, Quality Assurance Plans and Standard Operating Procedures [SOPs]), on-site audits, and PE samples are common means of assessing the capabilities of analytical laboratories. However, regulatory agency certification, on-site audits, and PE samples represent a snapshot of laboratory performance and do not guarantee the consistency of laboratory performance; none of these procedures are a substitute for the use of routine quality control (QC) samples in each analytical batch processed through the laboratory and monitoring of the trends revealed through routine QC procedures.

The PE samples used to assess the laboratories selected for participation in the LPRRP were obtained primarily from Resource Technology Corporation (RTC) of Laramie, Wyoming; this firm has provided support for a number of state and national laboratory certification programs and method studies. The goals in selecting PE samples were to challenge the laboratories with complex sample matrices, preferably real world sediment from contaminated sites, and to challenge the laboratories to meet project target detection limits whenever possible. RTC was selected as the primary supplier since it offers a variety of natural matrix samples, including sediment samples, for the parameters of interest to the LPRRP. RTC uses soils and solid materials collected from contaminated sites throughout the United States to develop certified reference materials for the United States Environmental Protection Agency (EPA) and laboratory certification programs. The PE samples offered by RTC are either natural matrix materials or natural matrix materials that have been fortified to provide specific analytical profiles. The samples are then certified using data developed from multi-laboratory analysis and in-house data. RTC offered a range of PE samples with a matrix similar to that which would be encountered during the LPRRP, but participating laboratories were not likely to have analyzed the same sample and have access to the certified concentration. The National Institute of Standards and Technology (NIST) was also considered as a source for this program, but many of the reference materials of interest were out of stock at the time the PE effort was initiated and the wide use of NIST reference materials by laboratories for internal QC purposes meant that the concentrations were also likely to be known to the laboratories. A NIST reference material was used for the grain size PE sample since no other source was available.

AECOM Environment
 2 Technology Park Drive, Westford, MA 01886
 T 978.589.3000 F 978.589.3035 www.aecom.com

**PRELIMINARY DRAFT – FOR DISCUSSION
 PURPOSES ONLY**

In addition, a NIST reference material and Lake Sediment obtained from Wellington Laboratories were used to provide additional assurance regarding the dioxin/furan analysis performed by Columbia Analytical Services (CAS).

To reduce the chance that the labs would have access to the sample source and concentration, all PE samples were shipped to ENSR Corporation (now AECOM Environment) where staff members experienced in the collection and analysis of environmental samples removed all labels indicating the sample source and identification (ID), relabeled the sample with an ID in the format that would be used during the LPRRP, prepared chains-of-custody, and packaged the samples for overnight shipment to the appropriate laboratory. Both the laboratory designated as the primary laboratory and that listed as the backup laboratory for a specific analysis received the same PE sample. Labs were directed to analyze the sample using the analytical procedures and SOPs specified in the *Quality Assurance Project Plan (QAPP), Remedial Investigation Low Resolution Coring/Sediment Sampling for the Lower Passaic River Restoration Project RI/FS (ENSR 2008)*. Appropriate PE samples could not be located for Atterberg Limits, the radiochemical parameters (Beryllium-7, Cesium-137, Lead-210, and Potassium-40), and acid volatile sulfide/simultaneously extracted metals (AVS/SEM). The State of Wisconsin Health Laboratory, which prepares PE samples for the EPA certification program for Giardia, indicated it might be able to provide a spiking solution for Giardia; consideration was given to providing a PE sample for that parameter to Analytical Services, Inc. if the full complement of proposed samples were collected for that parameter and the State of Wisconsin Health Laboratory could successfully prepare a spiking solution. At the time sampling began, AECOM Environment staff learned that the Wisconsin lab was encountering difficulties preparing a PE sample; therefore, that analyte was not included in the PE program.

A full list of the analyses evaluated, the PE sample source and product name or catalog number, and the laboratories receiving the sample are provided in Table 1. A summary of the results, problems encountered, and corrective action, if required, is presented in the following paragraphs.

Results and Corrective Action

Based on information provided by RTC, results have been compared to the certified value where both a certified value and gravimetric value have been provided; the certified value is that obtained from testing by multiple laboratories. RTC has provided an acceptance limit for most parameters that is based on the results obtained from actual laboratory analyses of the reference material; acceptance limits are calculated using the EPA Biweight Method. However, based on discussions with RTC, certified values and acceptance limits are, in some cases, based on a small data pool. Where NIST and Wellington Laboratories samples were provided for selected analyses, the certified values and acceptance limits associated with those samples have been used to assess laboratory performance. Laboratories were asked to review data and provide a response for results that were outside of acceptance limits; any information received as a result of those reviews has been incorporated here. All results are summarized in the attached tables.

Volatile Organics – Most reported values were within the supplier acceptance limits. CAS Kelso reported an elevated recovery for 4-Methyl-2-Pentanone (MIBK); the lab investigated this but could not identify a clear cause. CAS also reported 2-Hexanone as a non-detected value since the reference value was below the laboratory quantitation limit. It should be noted that the PE sample contained methanol which proved problematic for both laboratories and can particularly impact the purging efficiency of the ketones. CAS reported the result for trans-1,3-Dichloropropylene as cis-1,3-Dichloropropylene; a review of the data indicated a technician had mislabeled the peak. As a corrective

AECOM Environment
 2 Technology Park Drive, Westford, MA 01886
 T 978.589.3000 F 978.589.3035 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
 PURPOSES ONLY

action, CAS reported that the technician was given additional training prior to the receipt of samples from the LPRRP and his work is being subjected to additional review. CAS provided multiple rounds of PE samples required for NELAC certification; in each data set the results for volatile organic compounds in a solid matrix were acceptable. In addition, laboratory control samples in each sample batch provide qualitative and quantitative checks on the analytical process and the independent data validation process includes assessment of analyte identification. Results for volatile organics are provided in Table 2.

Semivolatile Organics and Polyaromatic Hydrocarbons (PAHs) – The PE sample for semivolatile organics was analyzed by both TestAmerica Knoxville (the primary laboratory) and CAS Kelso using procedures based on EPA Method 8270. In addition, TestAmerica Knoxville analyzed the same sample using the High Resolution Gas Chromatography/Low Resolution Mass Spectrometry (HRGC/LRMS) Selected Ion Monitoring (SIM) technique that would be used for determination of Alkylated PAHs. Results for Acenaphthene, Anthracene, and Benzo(a)pyrene were outside of control limits (low) for both laboratories using Method 8270 (Table 3), raising the possibility that there may have been a problem with the sample itself for these analytes or that the results reflect the limitations of the analytical method in this matrix. The values reported for Anthracene and Benzo(a)pyrene using the HRGC/LRMS SIM technique also produced values that were below the lower acceptance limit and, in the case of Benzo(a)pyrene, the value obtained using the SIM technique is similar to that reported by CAS using EPA Method 8270. CAS reported bis(2-ethylhexyl)phthalate as a non-detected value since the certified concentration was below the laboratory's reporting limit. Laboratory reviews of the data did not identify any obvious errors in the determination of these analytes.

Organochlorine Pesticides and Toxaphene – A sample designed for the determination of organochlorine pesticides (Table 5) by EPA Method 8081/8081A and a second sample containing only Toxaphene (Table 6) were provided to both laboratories designated for determination of pesticides by the gas chromatography/electron capture detector (GC/ECD) method described in EPA Methods 8081/8081A, as well as to the TestAmerica West Sacramento laboratory, which developed the High Resolution Gas Chromatography/High Resolution Mass Spectrometry (HRGC/HRMS) method for the low level detection of organochlorine pesticides. It was recognized that these samples might not be the most appropriate for analysis using the HRGC/HRMS method; however, there was interest in testing the accuracy of the newly developed method using an independent standard, as well as identifying whether the method had a specific bias when compared to the results obtained using the GC/ECD technique.

Initial data using GC/ECD from both CAS Kelso and TestAmerica Knoxville showed low recoveries for Endosulfan I and Endrin Aldehyde, although CAS results were within the established control limits. Endosulfan I was also low in the HRGC/HRMS analysis (although this result was within the established control limits), while Endrin Aldehyde recovered well in this method. RTC was contacted to determine if there was history of difficulty with these compounds in this sample; they were aware that these compounds proved problematic at times and felt that low recovery of these particular analytes was related to the extraction procedure. The HRGC/HRMS method showed a high bias overall when compared to data obtained using the GC/ECD method. Discussions with the TestAmerica West Sacramento laboratory indicated there was some difficulty with the standards being used at the time of the analysis, which may have accounted for some of the bias. All laboratory results reported for Toxaphene were within the supplier established acceptance limits. Each pesticide data set generated under the LPRRP includes batch specific QC samples which can be used to assess compound specific recovery and recovery trends during the program for all target pesticides.

AECOM Environment
 2 Technology Park Drive, Westford, MA 01886
 T 978.589.3000 F 978.589.3035 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
 PURPOSES ONLY

Polychlorinated Biphenyl (PCBs) (Aroclors) – A soil sample containing Aroclor 1260 was submitted to both TestAmerica Pittsburgh, the primary laboratory, and CAS Kelso. Both laboratories reported identical results, which were within the supplier established acceptance limits. These results are provided in Table 7.

PCBs (Congeners) – All results reported by TestAmerica Knoxville, the primary laboratory, were within the supplier established acceptance limits. Five results reported by CAS Houston were slightly below the lower acceptance limit. Results of these analyses are provided in Table 8. All PCB Congener data generated during the LPRRP has been provided by TestAmerica Knoxville; CAS Houston has not supported this analysis.

Herbicides – CAS Kelso and TestAmerica Pittsburgh analyzed the PE sample for Herbicides (Table 9). The results for TestAmerica (the primary lab for this analysis) were low but within the supplier's acceptance limits. Results reported by CAS suggested that there might be a factor of two error somewhere in the calculation; three of the six reported compounds were above the upper acceptance limit for this sample. CAS was asked to review their reported data to determine if an error was made in the calculation but did not find an error in calculations, dilutions, or the standards used for analysis. No additional follow-up was determined to be necessary; as the back up laboratory, CAS Kelso has not provided any herbicide data under the LPRRP.

Total Petroleum Hydrocarbon (TPH)-Extractables – A PE sample for TPH-Extractables was provided to TestAmerica laboratories in Edison and South Burlington (Table 10); Edison was the primary laboratory for this analysis. The supplier offers PE samples for TPH-Extractables designed for several state-specific analytical procedures; unfortunately there was no sample available specific to the New Jersey Department of Environmental Protection (NJDEP) procedure. In addition, the NJDEP procedure had been recently modified so there was some uncertainty about whether the selected PE sample would be appropriate for this analysis.

Initial results from the South Burlington laboratory showed good agreement with the certified value for Diesel Range Organics in the C12-C28 range. However, the concentration reported by the Edison laboratory was extremely low and the laboratory was asked to review their data to attempt to identify the cause. A corrective action provided by the Edison laboratory indicated the lab had never opened the PE sample designated for TPH-Extractables, but instead analyzed the sample designated for Hexavalent Chromium. As part of the corrective action, the laboratory analyzed the sample actually submitted for TPH-Extractables and reported a concentration within the control limits for the sample. As a result of this error and an assessment that the overall quality of the chromatography and reporting was better in the South Burlington laboratory, this analysis was transferred to the South Burlington laboratory effective September 2, 2008. Approximately 20 percent of the samples analyzed by the Edison laboratory have been sent to South Burlington for reanalysis. Pending the outcome of these reanalyses, all samples originally analyzed by the TestAmerica Edison laboratory may be reanalyzed by the South Burlington laboratory.

TPH-Purgeables – Results for TestAmerica Edison and CAS Kelso were very similar for this analysis; both concentrations were within the supplier stated acceptance limits, but the reported concentrations were low when compared with the reference value for Gasoline Range Organics in the C6 – C10 range (Table 11). Since both laboratories produced very similar results, neither laboratory could identify a source of error in their reported concentration, and the acceptance limits for this sample are extremely wide, the reliability of the reference value seems to be questionable. The supplier was contacted and did not have any specific information regarding difficulty with this particular sample but noted that the

AECOM Environment
 2 Technology Park Drive, Westford, MA 01886
 T 978.589.3000 F 978.589.3035 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
 PURPOSES ONLY

wide acceptance range reflected the variety of methods used for this analysis and also raised some questions regarding the shelf life for this material.

Dioxins/Furans – Results for Dioxins/Furans were reported by CAS Houston and TestAmerica Knoxville and are presented in Table 12. One result for TestAmerica (1,2,3,4,7,8,9-HpCDF) was above the upper control limit; TestAmerica results showed a general high bias for this analysis. Results reported by CAS showed an overall high bias with two analytes (1,2,3,4,6,7,8,9-OCDF and 2,3,7,8-TCDD) above the supplier's upper acceptance range. Values for Total TCDD and Total TCDF were also above their respective upper acceptance ranges. As the primary laboratory for this analysis, CAS was asked to review their data and provide an explanation for the high bias. CAS reported that all standards and QC samples were within acceptance limits. As a corrective action, CAS offered to analyze a QC sample provided by AECOM Environment from another source (AECOM Environment provided a QC sample from Wellington Laboratories) and analyze a NIST sample containing Dioxins and Furans; results of these analyses are reported in Tables 13 and 14, respectively. In addition, CAS provided the results of Quarterly Performance Study LPTP08, dated June 25, 2008, and LPTP08-S3, dated October 3, 2008, which were conducted by RTC and reported to various accrediting agencies, including the NJDEP. All results from these quarterly studies for Dioxins/Furans in soil by EPA 8290 and EPA 1613B and Dioxins/Furans in Tissue by EPA 1613B were acceptable. In addition, the laboratory control sample and other QC samples included in each analytical batch will provide continuous monitoring of analytical performance.

Target Analyte List (TAL) Metals – Analysis for TAL Metals was performed by CAS Kelso, the primary lab for this analysis, and Brooks Rand (Table 15). Recoveries for chromium and manganese were slightly above the upper acceptance limits for the CAS data. However, since the recoveries for chromium and manganese (123.7% and 119.0%, respectively) were within the EPA acceptance limits for aqueous spikes (75 – 125%), no corrective action was taken based on AECOM professional judgment. All other analytes were within the acceptance limits. It should be noted that the acceptance limits for several elements in this reference material are quite narrow; the acceptance limits for chromium are within approximately 7% of the reference value for this element. In addition, each data set reported by CAS for the LPRRP sampling program contains supporting QC data, allowing for monitoring of accuracy and precision for the associated data. Data reported by Brooks Rand generally showed a higher bias which is likely due to the more rigorous digestion procedure routinely utilized by this laboratory. In addition to manganese and chromium, aluminum and iron results were above the acceptance range in the Brooks Rand data. All metals data supporting the LPRRP have been provided by CAS and each sample delivery group contains supporting QC data.

Mercury/Methyl Mercury – Both Brooks Rand (the primary laboratory) and CAS Kelso analyzed samples for mercury and methyl mercury (Table 16). Brooks Rand initially reported mercury data with the incorrect units; when the units were corrected, it appeared that the mercury result was off by a factor of 100. The laboratory was asked to review all analytical procedures and calculations and reported that there had been a failure to include a dilution that was performed at the instrument level in the final calculation. Brooks Rand reissued the report and electronic deliverable and modified their internal documentation and review procedures to prevent future errors of this type. The corrected results for mercury and the original methyl mercury results are within the method acceptance limits. Results provided by CAS were below the lower acceptance limit for methyl mercury and the reported concentration for mercury suggests the possibility of a factor of two error somewhere in the calculation. CAS was asked to review their data to determine if there was a source for these errors but did not find any obvious errors in preparation of standards or the analytical procedures. All mercury and methyl mercury analysis for the LPRRP sampling program has been performed by Brooks Rand. Each

AECOM Environment
 2 Technology Park Drive, Westford, MA 01886
 T 978.589.3000 F 978.589.3035 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
 PURPOSES ONLY

analytical batch reported by Brooks Rand includes analysis of a reference material and the data validation process includes reproduction of at least one reported analytical result in each analytical batch from the raw data to reduce the chance of an undetected calculation error.

Hexavalent Chromium – Results reported by both laboratories (CAS Rochester and TestAmerica Edison) were within acceptance limits. These data are provided in Table 17.

Butyltins – Both CAS Kelso and TestAmerica South Burlington reported similar but very low recoveries for monobutyl, dibutyl, and tributyl tin (Table 18). The similarity between the laboratory results, generated using similar analytical procedures, suggested a possible problem with the sample itself and the supplier was contacted. RTC responded that this sample was a European Commission Certified Reference Material and they have not had a great deal of experience with this particular material. RTC did provide a copy of the European Commission Report on this material, which suggests that a correction factor may have been applied based on the recoveries obtained by laboratories providing data on this sample. However, the report doesn't confirm that a correction factor was applied or, if so, state what the correction factor was. The European Commission report does note that their research showed "that a wide range of recoveries was obtained, depending on the type of reagents and procedures employed. The organotin compounds considered do not respond in the same way to a given extraction method; harsh extraction conditions may improve the yield for one compound while causing degradation of another. It was clear there was no 'universal' method which could be applied for all compounds." The European Commission report also noted that stabilization of the organotin compounds for long term use as a reference material was problematic. RTC contacted the European Commission requesting further information but that effort did not provide any additional information beyond that already contained in the existing report. The results for this PE are considered inconclusive. However, the agreement between the laboratories suggests that the problem may rest with the PE sample or differences between analytical methods used to determine the certified value and those used by the LPRRP laboratories.

Ammonia – Results reported by both laboratories (CAS Kelso and TestAmerica North Canton) were within acceptance limits. Results for ammonia are provided in Table 19.

Cyanide – Samples for analysis of cyanide were submitted to CAS Kelso (primary laboratory) and TestAmerica North Canton. No data were obtained from CAS; the laboratory apparently did not see the spiking solution provided as a separate ampoule and accidentally discarded it. The result reported by TestAmerica was below the lower acceptance limit for this analysis (Table 19). Therefore no acceptable data were obtained for this analysis. The requested PE sample for cyanide was not available at the time of the initial shipment of PE samples; the cyanide PE sample arrived several weeks later when field sampling was about to start. Since CAS was able to provide four sets of PE data generated from NELAC blind performance studies which showed acceptable recovery of cyanide in a solid matrix and sampling was already underway, no effort was made to resubmit a PE sample for this analyte. Each set of cyanide data reported for the LPRRP sampling program includes QC samples that permit monitoring of analytical accuracy and precision.

Total Kjeldahl Nitrogen (TKN) – Results reported by both laboratories (CAS Kelso and TestAmerica North Canton) were within acceptance limits. Data for this analysis are provided in Table 19.

Total Phosphorus – The result reported by TestAmerica North Canton, which is the back up laboratory for this analysis, was below the lower acceptance limit. The laboratory reviewed their data but could not

AECOM Environment
 2 Technology Park Drive, Westford, MA 01886
 T 978.589.3000 F 978.589.3035 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
 PURPOSES ONLY

identify a source of error. The result reported by CAS Kelso, which is the primary laboratory for this analysis, was within the supplier acceptance limits. Data for this analysis are presented in Table 19.

Total Organic Carbon (TOC) – Results reported by both laboratories (CAS Kelso and TestAmerica Pittsburgh) were within acceptance limits. Results are provided in Table 19.

Total Sulfide – Results reported by both laboratories (CAS Kelso and TestAmerica Pittsburgh) were low but within acceptance limits (Table 19). The supplier reports a lower control limit of nondetect for this sample, suggesting that both the sample and the methods commonly used for sulfide determination may be unreliable.

Grain Size Analysis – Grain Size analysis was performed using NIST Reference Material 8010, Material C. Incomplete directions were provided to the laboratories regarding the sieve sizes required for this sample; therefore, it is difficult to directly compare the results reported by CAS Kelso (primary laboratory) and TestAmerica South Burlington with the NIST reference values. However, both laboratories reported total sample weights within 2 percent of the NIST value of 130 grams (g) and the data reported by both laboratories show that the grain size is primarily concentrated in the range of 75 to 180 micrometers (μm) (Sieve Nos. 80 to 200), which agrees with the NIST distribution (Table 20). The CAS data showed that 98.1 percent of the sample weight fell into the range of 75 to 180 μm ; TestAmerica reported 97.5 percent of the sample weight within that range. The NIST data show that 93.2 percent of the sample weight falls within that range.

Specific Gravity – Results reported by both laboratories (CAS Kelso and TestAmerica South Burlington) were within acceptance limits; results are presented in Table 21.

Conclusion

PE samples were obtained for most analytical methods which were conducted during the LPRRP Remedial Investigation; PE samples were not available for the radiochemical analyses, AVS/SEM, certain physical parameters, and Giardia. The PE samples obtained were real world samples obtained from contaminated sites within the United States or, in the case of the Butyltin, a freshwater North Sea canal sediment. The samples were expected to present analytical challenges to the laboratories due to the variety of analytes present and the concentration ranges. Of the 564 possible analytical results in this PE program (based on the number of reference values for each sample and the number of labs that received the sample), 40 results (7.1%) were either outside the supplier's acceptance range or not reported due to laboratory error; the remaining 92.9% of the reported values were within the supplier's acceptance limits. Laboratories who routinely participate in PE studies will periodically fail to meet acceptance limits for one or more individual analytes; sometimes the laboratory can quickly identify the source of error or a supplier review of data will identify a systemic problem with a particular sample; at other times there is no clear answer. Daily performance of the laboratory is best monitored through the routine use of laboratory control samples for the assessment of accuracy and laboratory duplicates for the assessment of analytical precision. Monitoring of these samples can permit the laboratory to identify trends and correct problems before an analytical system is out of control. Each analytical batch processed under the LPRRP includes multiple QC samples designed to monitor the performance of the laboratory on that specific sample set. If the QC sample results fall outside of the established limits, the laboratory is required to take action which may include reanalysis of the entire batch. These batch specific QC samples are the most reliable indicator of ongoing laboratory performance under actual daily conditions.

AECOM Environment
 2 Technology Park Drive, Westford, MA 01886
 T 978.589.3000 F 978.589.3035 www.aecom.com

**PRELIMINARY DRAFT – FOR DISCUSSION
 PURPOSES ONLY**

Table 1: Performance Evaluation Sample Summary

Analysis	Catalog Number/Name	Laboratories
Volatile Organics	VOA Contaminated Soil CRM631-030	TestAmerica – Knoxville, TN Columbia Analytical Services (CAS) – Kelso, WA
Semivolatile Organics	RTC PAH Contaminated Soil/Sediment CRM104-100	TestAmerica – Knoxville, TN CAS – Kelso, WA
PAHs	RTC PAH Contaminated Soil/Sediment CRM104-100	TestAmerica – Knoxville, TN
Organochlorine Pesticides (GC/ECD)	RTC Pesticides in Soil SQC009	CAS – Kelso, WA TestAmerica – Knoxville, TN
Organochlorine Pesticides (HRGC/HRMS)	RTC Pesticides in Soil SQC009	TestAmerica – West Sacramento, CA
Toxaphene (GC/ECD)	RTC Toxaphene in Soil SQC028	CAS – Kelso, WA TestAmerica – Knoxville, TN
Toxaphene (HRGC/HRMS)	RTC Toxaphene in Soil SQC028	TestAmerica – West Sacramento, CA
PCBs (Aroclors)	RTC PCB in Soil SQC010	TestAmerica – Pittsburgh, PA CAS – Kelso, WA
PCBs (Congeners)	RTC PCB Congeners in Soil SQC068	TestAmerica – Knoxville, TN CAS – Houston, TX
Herbicides	RTC Herbicides in Soil CRM831-050	TestAmerica – Pittsburgh, PA CAS – Kelso, WA
TPH-Extractables	RTC Diesel in Soil SQC007	TestAmerica – Edison, NJ TestAmerica – Burlington, VT
TPH-Purgeables	RTC Gasoline in Soil SQC008	TestAmerica – Edison, NJ CAS – Rochester, NY
Dioxins/Furans	RTC Dioxins and Furans in Soil QC016	CAS – Houston, TX TestAmerica – Knoxville, TN
Dioxins/Furans	Wellington Laboratories WMS-01 Lake Sediment NIST SRM1944	CAS – Houston, TX
TAL Metals	RTC Metals on Sewage Sludge CRM018-050	CAS – Kelso, WA Brooks Rand – Seattle, WA
Mercury, Methyl Mercury	RTC Estuarine Sediment ERM CC580	Brooks Rand – Seattle, WA CAS – Kelso, WA
Hexavalent Chromium	RTC Chromium VI in Soil SQC 012	CAS – Rochester, NY TestAmerica – Edison, NJ
Butyltins	RTC European Commission Certified Reference Material BCR-646	CAS – Kelso, WA TestAmerica – Burlington, VT
Ammonia	RTC Nutrients in Soil SQC014	CAS – Kelso, WA TestAmerica – North Canton, OH

AECOM Environment
 2 Technology Park Drive, Westford, MA 01886
 T 978.589.3000 F 978.589.3035 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
 PURPOSES ONLY

Table 1: Performance Evaluation Sample Summary (cont'd)

Cyanide	RTC SQC011 Cyanide in Soil	CAS – Kelso, WA TestAmerica – North Canton, OH
Total Kjeldahl Nitrogen	RTC Nutrients in Soil SQC014	CAS – Kelso, WA TestAmerica – North Canton, OH
Total Phosphorus	RTC Nutrients in Soil SQC014	CAS – Kelso, WA TestAmerica – North Canton, OH
Total Organic Carbon	RTC Nutrients in Soil SQC014	CAS – Kelso, WA TestAmerica – Pittsburgh, PA
Total Sulfide	RTC Sulfide in Soil SQC102	CAS – Kelso, WA TestAmerica – Pittsburgh, PA
Grain Size	NIST 8010, Material C	CAS – Kelso, WA TestAmerica – Burlington, VT
Specific Gravity	RTC Specific Gravity SQC066	CAS-Kelso, WA TestAmerica – Burlington, VT

VOA: Volatile Organic Analytes

CAS: Columbia Analytical Services

RTC: Resource Technology Corporation

PAH: Polyaromatic Hydrocarbon

GC/ECD: Gas chromatography/electron capture detector

HRGC/HRMS: High Resolution Gas Chromatography/High Resolution Mass Spectrometry

PCB: Polychlorinated Biphenyl

TPH: Total Petroleum Hydrocarbons

NIST: National Institute of Standards and Technology

TAL: Target Analyte List

AECOM Environment
 2 Technology Park Drive, Westford, MA 01886
 T 978.589.3000 F 978.589.3035 www.aecom.com

**PRELIMINARY DRAFT – FOR DISCUSSION
 PURPOSES ONLY**

Table 2: Volatile Organics: VOA Contaminated Soil CRM631-030

Compound	Reference Value (ug/Kg)	Reported Concentration TestAmerica (ug/Kg)	Percent Recovery (%)	Reported Concentration CAS (ug/Kg)	Percent Recovery (%)	Prediction Interval (ug/Kg)
Acetone	6760	4610	68.2	7200	106.5	0.00 - 17000
Benzene	72	70	97.2	75	104.2	35.6 - 108
Bromodichloro-methane	74.9	82.4	110.0	81	108.1	14.0 - 136
Bromoform	64.1	72.9	113.7	36	56.2	0.00 - 131
2-Butanone (MEK)	113	89	78.8	150	132.7	34.6 - 192
Carbon Disulfide	43.3	16	37.0	23	53.1	0 - 98.1
Chlorobenzene	145	156	107.6	120	82.8	68.6 - 222
Chloroethane	61.9	12	19.4	81	130.9	0 - 145
Chloroform	60.4	57.8	95.7	74	122.5	26.5 - 94.3
Dibromochloro-methane	84.2	99.8	118.5	54	64.1	2.37 - 166
Dibromomethane	141	Non target analyte	NA	Not target analyte	NA	64.7 - 217
1,2-Dichlorobenzene	114	125	109.6	95	83.3	45.6 - 181
1,3-Dichlorobenzene	79	90.4	114.4	63	79.7	26.8 - 131
1,4-Dichlorobenzene	80.4	89.7	111.6	65	80.8	30.6 - 130
1,1-Dichloroethane	82.5	75.8	91.9	100	121.2	27.0 - 138
1,1-Dichloroethylene	87.8	62.7	71.4	110	125.3	0.00 - 179
cis-1,2-Dichloroethylene	114	114	100.0	120	105.3	51.2 - 177
1,2-Dichloropropane	54.7	55.1	100.7	71	129.8	28.3 - 81.0
trans-1,3-Dichloropropylene	46.7	51.1	109.4	48*	102.8	8.79 - 84.6
Ethylbenzene	124	129	104.0	100	80.6	59.3 - 188
2-Hexanone	15.4	13.3	86.4	71U	Not detected	1.27 - 29.6
Isopropylbenzene	58.5	58.7	100.3	51	87.2	23.8 - 93.1
Bromomethane	58.3	9.16	15.7	36U	Not detected	0 - 145

AECOM Environment
 2 Technology Park Drive, Westford, MA 01886
 T 978.589.3000 F 978.589.3035 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
 PURPOSES ONLY

Table 2: Volatile Organics: VOA Contaminated Soil CRM631-030 (cont'd)

Compound	Reference Value (ug/Kg)	Reported Concentration TestAmerica (ug/Kg)	Percent Recovery (%)	Reported Concentration CAS (ug/Kg)	Percent Recovery (%)	Prediction Interval (ug/Kg)
Methylene Chloride	162	142	87.7	210	129.6	31.7 - 292
4-Methyl-2-Pentanone (MIBK)	69.5	74.5	107.2	150	215.8	12.3 - 127
Methyl tert-butyl ether (MTBE)	445	263	59.1	520	116.9	0 - 903
1,1,1,2-Tetrachloroethane	80.2	Not target analyte	NA	Not target analyte	NA	28.2 - 132
1,1,2,2-Tetrachloroethane	26.3	26.3	100.0	26	98.9	10.5 - 42
Tetrachloroethylene	18.2	8.71	47.9	18U	Not detected	0 - 37.1
Toluene	77.5	80	103.2	86	111.0	37.1 - 118
1,1,1-Trichloroethane	44.7	39	87.2	65	145.4	14.7 - 74.7
Trichloroethene	35.7	35.4	99.2	43	120.4	14.6 - 56.8
Trichlorofluoromethane	42.2	15	35.5	48	113.7	9.82 - 74.5
1,2,3-Trichloropropane	24.2	Not target analyte	NA	Not target analyte	NA	9.69 - 38.8
1,2,4-Trimethylbenzene	109	Not target analyte	NA	Not target analyte	NA	34.6 - 183
1,3,5-Trimethylbenzene	24.3	Not target analyte	NA	Not target analyte	NA	7.49 - 41.1
m + p-Xylene	94.5	101	106.9	78	82.5	38.4 - 151
o-Xylene	79.9	92.7	116.0	75	93.9	28.9 - 131
Total Xylene	173					49.2 - 297
Shaded results are outside 95% confidence interval						
* Reported as cis-1,3-Dichloropropene CAS: Columbia Analytical Services VOA: Volatile Organic Analytes ug/Kg: Micrograms per kilogram NA: Not applicable U: Undetected						

AECOM Environment
 2 Technology Park Drive, Westford, MA 01886
 T 978.589.3000 F 978.589.3035 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
 PURPOSES ONLY

Table 3: PAH Contaminated Soil/Sediment CRM104-100 by EPA Method 8270

Analyte	Reference Concentration (ug/Kg)	Reported Concentration - CAS (ug/Kg)	Percent Recovery (%)	Reported Concentration-TestAmerica (ug/Kg)	Percent Recovery (%)	Acceptance Limits (ug/Kg)
1,2-Dichlorobenzene	49.9	NR	NA	NR		
Naphthalene	565	390	69.0	454	80.4	290 - 841
1,2,4-Trichlorobenzene	1120	NR	NA	NR		611 - 1630
Acenaphthene	544	230	42.3	218	40.1	294 - 795
Anthracene	365	22	6.0	ND (<343)		162 - 569
Benzo(a)anthracene	5410	3500	64.7	3610	66.7	3240 - 7590
Benzo(a)pyrene	396	64	16.2	ND (<343)		115 - 678
Benzo(b)fluoranthene	5220	5500	105.4	5250	100.6	3240 - 7200
Benzo(g,h,i)perylene	378	320	84.7	278	73.5	182 - 575
Benzo(k)fluoranthene	3490	3300	94.6	3710	106.3	1940 - 5040
4-Bromophenyl phenyl ether	1980	1700	85.9	2230	112.6	1260 - 2700
Butyl benzyl phthalate	491	440	89.6	443	90.2	270 - 711
Chrysene	6590	6700	101.7	6510	98.8	4080 - 9110
Dibenz(a,h) anthracene	1080	1200	111.1	1010	93.5	614 - 1540
Dibenzofuran	429	370	86.2	382	89.0	259 - 600
Di-n-butyl phthalate	465	390	83.9	450	96.8	246 - 684
Diethyl phthalate	6520	5600	85.9	6660	102.1	3120 - 9390
2,4-Dinitrotoluene	1730	1700	98.3	1560	90.2	808 - 2650
Di-n-octyl phthalate	764	560	73.3	643	84.2	379 - 1150
bis(2-ethylhexyl)phthalate	1340	ND (2000)	<1	1290	96.3	774 - 1910
Fluoranthene	9200	8600	93.5	8800	95.7	5880 - 12500
Fluorene	626	420	67.1	404	64.5	382 - 871
Hexachlorobenzene	609	600	98.5	561	92.1	360 - 858
2-Methylnaphthalene	280	180	64.3	199	71.1	132 - 428
2-Nitrophenol	363	360	99.2	406	111.8	36.8 - 689
Phenanthrene	4660	4300	92.3	4500	96.6	3000 - 6310
Phenol	888	520	58.6	592	66.7	393 - 1380
Pyrene	7430	6200	83.4	6690	90.0	4360 - 10500
2,4,5-Trichlorophenol	1600	1500	93.8	1550	96.9	477 - 2720
2,4,6-Trichlorophenol	908	850	93.6	942	103.7	399 - 1420
PAH: Polyaromatic Hydrocarbon ug/Kg: Micrograms per kilogram CAS: Columbia Analytical Services NR: Not reported (not target analyte) NA: Not applicable ND: Not detected Exceeds acceptance limits.						

AECOM Environment
 2 Technology Park Drive, Westford, MA 01886
 T 978.589.3000 F 978.589.3035 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
 PURPOSES ONLY

Table 4: PAHs in Soil CRM104-100 by HRGC/LRMS SIM

Analyte	Reference Concentration (ug/Kg)	Reported Concentration- TestAmerica (ug/Kg) HRGC/LRMS SIM Procedure	Percent Recovery (%)	Acceptance Limits (ug/Kg)
1,2-Dichlorobenzene	49.9	Non-target analyte	NA	NA
Naphthalene	565	561	99.3	611 -1630
1,2,4-Trichlorobenzene	1120	Non-target analyte	NA	NA
Acenaphthene	544	321	59.0	294 - 795
Anthracene	365	58.1	15.9	162 - 569
Benzo(a)anthracene	5410	4660	86.1	3240 -7590
Benzo(a)pyrene	396	69.1	17.4	115 - 678
Benzo(b)fluoranthene	5220	6230	119.3	3240 - 7200
Benzo(g,h,i)perylene	378	422	111.6	182 - 575
Benzo(k)fluoranthene	3490	4010	114.9	1940 - 5040
4-Bromophenyl phenyl ether	1980	Non-target analyte	NA	NA
Butyl benzyl phthalate	491	Non-target analyte	NA	NA
Chrysene	6590	7830	118.8	4080 - 9110
Dibenz(a,h) anthracene	1080	914	84.6	614 - 1540
Dibenzofuran	429	Non-target analyte	NA	NA
Di-n-butyl phthalate	465	Non-target analyte	NA	NA
Diethyl phthalate	6520	Non-target analyte	NA	NA
2,4-Dinitrotoluene	1730	Non-target analyte	NA	NA
Di-n-octyl phthalate	764	Non-target analyte	NA	NA
bis(2-ethylhexyl)phthalate	1340	Non-target analyte	NA	NA
Fluoranthene	9200	11200	121.7	5880 - 12500
Fluorene	626	527	84.2	382 - 871
Hexachlorobenzene	609	Non-target analyte	NA	NA
2-Methylnaphthalene	280	284	101.4	132 - 428
2-Nitrophenol	363	Non-target analyte	NA	NA
Phenanthrene	4660	5830	125.1	3000 - 6310
Phenol	888	Non-target analyte	NA	NA
Pyrene	7430	7950	107.0	4360 - 10500
2,4,5-Trichlorophenol	1600	Non-target analyte	NA	NA
2,4,6-Trichlorophenol	908	Non-target analyte	NA	NA
PAHs: Polyaromatic Hydrocarbons HRGC: High Resolution Gas Chromatography LRMS: Low Resolution Mass Spectrometry SIM: Selected Ion Monitoring ug/Kg: Micrograms per kilogram NA: Not applicable Exceeds acceptance limits				

AECOM Environment
2 Technology Park Drive, Westford, MA 01866
T 978.589.3000 F 978.589.3100 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
PURPOSES ONLY

Table 5: Pesticides in Soil SQC009

Analyte	Reference Concentration (ug/Kg)	Reported Concentration - CAS	CAS Percent Recovery (%)	Reported Concentration-TestAmerica (ug/Kg) 8081 GC/ECD	Lab Qualifier	TestAmerica 8081 GC/ECD Percent Recovery (%)	Reported Concentration-TestAmerica (ug/Kg) HRGC/HRMS	Lab Qualifier	TestAmerica HRGC/HRMS Percent Recovery (%)	Acceptance Limits (ug/Kg)
Hexachlorobenzene	279.36	290	103.8	220		78.8	376.0	B	134.6	0 - 609
Aldrin	299.33	290	96.9	178		59.5	419.0	B	140.0	112 - 487
delta-BHC	159.37	180	112.9	128		80.3	223.0		139.9	43.2 - 275
alpha-BHC	77.01	77	100.0	64.2		83.4	104.0	B	135.0	21.2 - 133
gamma-BHC	320.54	330	103.0	248		77.4	461.0	B	143.8	115 - 527
alpha-Chlordane	287.45	320	111.3	236		82.1	431.0	B	149.9	118 - 457
gamma-Chlordane	311.11	340	109.3	288		92.6	435.0	B	139.8	154 - 469
4,4'-DDD	65.08	70	107.6	52.5		80.7	82.7		127.1	7.44 - 123
4,4'-DDE	307.28	340	110.6	257		83.6	409.0		133.1	126 - 488
4,4'-DDT	303.68	380	125.1	266		87.6	450.0		148.2	91.4 - 516
Dieldrin	208.17	240	115.3	182		87.4	295.0	B	141.7	84.4 - 332
Endosulfan I	131	47	35.9	8.69	QNC	6.6	45.4		34.7	12.7 - 303
Endosulfan II	230.28	260	112.9	171		74.3	307.0	B	133.3	80.6 - 380
Endosulfan Sulfate	176.76	230	130.1	111		62.8	248.0		140.3	44.0 - 310
Endrin Aldehyde	167.04	84	50.3	18		10.8	153.0		91.6	21.0 - 313
Endrin ketone	151.58	170	112.2	126		83.1	159.0		104.9	43.8 - 259
Endrin	331.9	350	105.5	275		82.9	480.0	B	144.6	168 - 496
Heptachlor	105.54	89	84.3	71.1		67.4	127.0		120.3	36.1 - 175
Heptachlor Epoxide	0	ND	NA	ND		NA	0.0200	J	NA	0 - 0
Methoxychlor	146.64	170	115.9	146		99.6	196.0		133.7	9.81 - 284

AECOM Environment
2 Technology Park Drive, Westford, MA 01866
T 978.589.3000 F 978.589.3100 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
PURPOSES ONLY

Table 5: Pesticides in Soil SQC009

Propachlor	483	Not target analyte	NA	Not target analyte		NA	Not target analyte	NA	NA	193 – 773
Trifluralin	55.2	Not target analyte	NA	Not target analyte		NA	Not target analyte	NA	NA	22.1 - 88. 3
2,4'-DDD	Not reported						0.0888	J,Q	NA	Not reported
2,4'-DDE	Not reported						0.317	J,Q	NA	Not reported
ug/Kg: Micrograms per kilogram CAS: Columbia Analytical Services B: The associated method blank contains the target analyte at a reportable level J: Estimated result. Result is less than the reporting limit Q: Estimated maximum possible concentration QNC: Quantitative second column confirmation not conclusive. NA: Not applicable ND: Not detected <div style="background-color: #e6f2ff; padding: 2px;">Exceeds acceptance limits.</div>										

AECOM Environment
2 Technology Park Drive, Westford, MA 01866
T 978.589.3000 F 978.589.3100 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
PURPOSES ONLY

Table 6: Toxaphene in Soil SQC028

Analyte	Reference Concentration (ug/Kg)	Reported Concentration - CAS	CAS Percent Recovery (%)	Reported Concentration-TestAmerica (ug/Kg) 8081 GC/ECD	Lab Qualifier	TestAmerica 8081 GC/ECD Percent Recovery (%)	Reported Concentration-TestAmerica (ug/Kg) HRGC/HRMS	Lab Qualifier	TestAmerica HRGC/HRMS Percent Recovery (%)	Acceptance Limits (ug/Kg)
Toxaphene	306	350	114.4	220	AP	71.9	267		87.3	89.7 - 522
AP: Altered Pattern										

Table 7: PCB in Soil SQC010

Analyte	Reference Concentration (ug/Kg)	Reported Concentration CAS (pg/g)	Percent Recovery	Reported Concentration TestAmerica (pg/g)	Percent Recovery	Acceptance Limits (pg/g)
Aroclor - 1016	0					
Aroclor - 1221	0					
Aroclor - 1232	0					
Aroclor - 1242	0					
Aroclor - 1248	0					
Aroclor - 1254	0					
Aroclor - 1260	1840	1300	70.7	1300	70.7	270 - 3720
Aroclor - 1016/1242	0					

CAS: Columbia Analytical Services
ug/Kg: Micrograms per kilogram
pg/g: Picograms per gram

AECOM Environment
2 Technology Park Drive, Westford, MA 01866
T 978.589.3000 F 978.589.3100 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
PURPOSES ONLY

Table 8: PCB Congeners in Soil SQC068

Analyte	Reference Concentration (ug/Kg)	Reported Concentration CAS	Lab Qualifier	Percent Recovery (%)	Reported Concentration-TestAmerica (ug/Kg)	Lab Qualifier	Percent Recovery (%)	Acceptance Limits (ug/Kg)
PCBs, Total	3600	2550		70.8	Not Reported			2520 - 4680
PCB 20					145	B, C		
PCB 28	193	118	C20	61.1	145	B, C20	75.1	135 - 251
PCB 52	205	121	E	59.0	154		75.1	144 - 267
PCB 77	243	169	E	69.5	203	E	83.5	146 - 389
PCB 81	180	138	E	76.7	157		87.2	108 - 288
PCB 90					100	C		
PCB 101	134	85.7	E C90, 113	64.0	100	C90	74.6	93.8 - 174
PCB 105	133	90.1	E	67.7	97.4		73.2	66.5 - 200
PCB 113					100	C90		
PCB 118	168	124	E	73.8	161		95.8	118 - 218
PCB 123	219	145	E	66.2	204	E	93.2	131 - 350
PCB 114	147	108	E	73.5	129		87.8	73.5 - 221
PCB 126	121	98.1	E	81.1	113		93.4	72.6 - 194
PCB 129					205	C		
PCB 138	292	198	E, C129, 163	67.8	205	C129	70.2	204 - 380
PCB 153	220	147	E, C168	66.8	149	C	67.7	132 - 308
PCB 157	479				436	C156, E	91.0	240 - 719
PCB 156	446				436	C, E	97.8	223 - 669
PCB 160					205	C129		
PCB 163					205	C129		

AECOM Environment
2 Technology Park Drive, Westford, MA 01866
T 978.589.3000 F 978.589.3100 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
PURPOSES ONLY

Table 8: PCB Congeners in Soil SQC068 (cont'd)

Analyte	Reference Concentration (ug/Kg)	Reported Concentration CAS	Lab Qualifier	Percent Recovery (%)	Reported Concentration-TestAmerica (ug/Kg)	Lab Qualifier	Percent Recovery (%)	Acceptance Limits (ug/Kg)
PCB 167	204	176	E	86.3	207	E	101.5	143 – 347
PCB 168					149	C153		
PCB 169	189	155	E	82.0	149		78.8	94.5 - 284
PCB 180	313	184	E, C193	58.8	213	C	68.1	188 - 438
PCB 189	221	189	E	85.5	200	E	90.5	111 - 332
PCB 193					213	C180		248 -744
PCB (156) +(157)	496	292		58.9				
Monochlorobiphenyl, Total		0.124			0.015	Q, J		
Dichlorobiphenyl, Total		0.163			0.332	Q, J		
Trichlorobiphenyl, Total		120			146	Q, B		
Tetrachlorobiphenyl, Total		429			516	Q, E		
Pentachlorobiphenyl, Total		653			806	Q, E		
Hexachlorobiphenyl, Total		969			1150	E		
Heptachlorobiphenyl, Total		374			414	E		
Octachlorobiphenyl, Total		0.945			0.696	Q		
Nonachlorobiphenyl, Total		0.0106	J					
PCB: Polychlorinated Biphenyl CAS: Columbia Analytical Services ug/Kg: Micrograms per kilogram B: Method blank contamination. The associated method blank contains the target analyte at a reportable level C: Co-eluting isomer E: Estimated result. Result concentration exceeds the calibration range. J: Estimated result. Q: Estimated maximum possible concentration (EMPC) Exceeds acceptance limits								

AECOM Environment
2 Technology Park Drive, Westford, MA 01866
T 978.589.3000 F 978.589.3100 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
PURPOSES ONLY

Table 9: Herbicides in Soil CRM831-050

Analyte	Reference Concentration (ug/Kg)	Reported Concentration - CAS	Percent Recovery (%)	Reported Concentration- TestAmerica (ug/Kg)	Percent Recovery (%)	Acceptance Limits (ug/Kg)
2,4,5-T	172	360	209.3	67.9	39.5	6.96 - 338
2,4,5-TP (Silvex)	297	570	191.9	126	42.4	120 - 474
2,4-D	315	570	181.0	133	42.2	28.9 - 602
2,4-DB	261	540	206.9	146	55.9	94.3 - 427
Dalapon	158	230	145.6	NR		0.00 - 337
Dicamba	374	660	176.5	NR		113 - 635
Pentachlorophenol	161					0.00 - 391
ug/Kg: Micrograms per kilogram CAS: Columbia Analytical Services NR: Not Reported <div>Exceeds acceptance limits</div>						

Table 10: Diesel in Soil SQC007

Parameter	Reference Value (mg/Kg)	Reported Concentration TestAmerica Edison (mg/Kg)	Percent Recovery (%)	Reported Concentration TestAmerica Burlington (mg/Kg)	Percent Recovery (%)	Acceptance Limits (mg/Kg)
Diesel Range Organics, C12 to C28	893.79	157	17.6	810	90.6	331 - 1460
		1040	116.4			
mg/Kg: Milligrams per kilogram <div>Exceeds acceptance limits</div>						

Table 11: Gasoline in Soil SQC008

Parameter	Reference Value (mg/Kg)	Reported Concentration TestAmerica (mg/Kg)	Percent Recovery (%)	Reported Concentration CAS (mg/Kg)	Percent Recovery (%)	Acceptance Limits (mg/Kg)
Gasoline Range Organics, C6-C10	625	230	36.8	280	44.8	43.8 - 1210
CAS: Columbia Analytical Services mg/Kg: Milligrams per kilogram						

Table 12: Dioxins and Furans in Soil QC016

Analyte	Reference Concentration (pg/g)	Reported Concentration CAS (pg/g)	Percent Recovery	Reported Concentration TestAmerica (pg/g)	Percent Recovery	Acceptance Limits (pg/g)
1,2,3,4,6,7,8-HpCDF	1908.47	2510	131.5	2280	119.5	1120 - 2690
1,2,3,4,7,8,9-HpCDF	7.53	11.2	148.7	12.1	160.7	0 - 11.6
1,2,3,4,6,7,8-HpCDD	294.51	350	118.8	338	114.8	162 - 427
HpCDD, Total	296.59	361	121.7			163 - 430
HpCDF, Total	1862.96	2160	115.9			733 - 2990
1,2,3,4,7,8-HxCDD	647	782	120.9	650	100.5	356 - 938
1,2,3,6,7,8-HxCDD	186.7	204	109.3	218	116.8	103 - 271
1,2,3,7,8,9-HxCDD	623.88	579	92.8	590	94.6	343 - 905
HxCDD, Total	1454.38	1560	107.3			769 - 2140
1,2,3,4,7,8-HxCDF	125.98	150	119.1	132	104.8	69.3 - 183
1,2,3,6,7,8-HxCDF	4.68	4.94	105.6	9.19	196.4	0 - 12.9
1,2,3,7,8,9-HxCDF	0	ND	NA	ND		0 - 0
2,3,4,6,7,8-HxCDF	3.23	4.34	134.4	12.7	393.2	0 - 12.98
HxCDF, Total	134.87	166	123.1			74.2 - 196
1,2,3,4,6,7,8,9-OCDF	6207.53	9490	152.9	6250	100.7	3410 - 9000
1,2,3,4,6,7,8,9-OCDD	2701.29	3190	118.1	2960	109.6	1490 - 3920
1,2,3,7,8-PeCDD	861.06	1040	120.8	891	103.5	474 - 1250
1,2,3,7,8-PeCDF	0	0.399		ND		0 - 0
2,3,4,7,8-PeCDF	0	0.381		1.76		0 - 0
PeCDF, Total	0	ND				0 - 0
PeCDD, Total	881.3	1190	135.0			500 - 1260
2,3,7,8-TCDD	380.07	587	154.4	376	98.9	209 - 551
2,3,7,8-TCDF	478.94	634	132.4	505	105.4	263 - 694
TCDF, total	493.16	741	150.3			271 - 715
TCDD, total	388.79	587	151.0			207 - 571
PCDD, total	5520.57					3950 - 7090
PCDD + PCDF, total	14059.9					7730 - 20,400
PCDF, total	8537.97					4700 - 12400
pg/g: Picograms per gram						
CAS: Columbia Analytical Services						
ND: Not detected						
Outside of acceptance limits						

AECOM Environment
2 Technology Park Drive, Westford, MA 01866
T 978.589.3000 F 978.589.3100 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
PURPOSES ONLY

Table 13: Dioxins and Furans Wellington Laboratories WMS-01 Lake Sediment (CAS only)

Analyte	Reference Concentration (ng/Kg)	Reported Concentration CAS (ng/Kg)	Qualifier	Percent Recovery
2,3,7,8-TCDD	17.7	19.9		112.4
1,2,3,7,8-PeCDD	7.96	7.09	J	89.1
1,2,3,4,7,8-HxCDD	8.66	6.31	J	72.9
1,2,3,6,7,8-HxCDD	20.8	22.8		109.6
1,2,3,7,8,9-HxCDD	17.3	18.6		107.5
1,2,3,4,6,7,8-HpCDD	293	324	B	110.6
OCDD	1899	1930	B	101.6
2,3,7,8-TCDF	52.5	57.8		110.1
1,2,3,7,8-PeCDF	12.6	13.4	J	106.3
2,3,4,7,8-PeCDF	18.5	21.4		115.7
1,2,3,4,7,8-HxCDF	67.3	83.3		123.8
1,2,3,6,7,8-HxCDF	20.3	24.4		120.2
1,2,3,7,8,9-HxCDF	2.68 (a)	0.884	J	34.0
2,3,4,6,7,8-HxCDF	16	18.5		115.6
1,2,3,4,6,7,8-HpCDF	299	320	B	107.0
1,2,3,4,7,8,9-HpCDF	15.1	13.9	J	92.1
OCDF	509	540	B	106.1
Total Tetra-Dioxins	60.1	55.8		92.8
Total Penta-Dioxins	69.5	78.1		112.4
Total Hexa-Dioxins	238	254		106.7
Total Hepta-Dioxins	608	717		117.9
Total Tetra-Furans	374	439		117.4
Total Penta-Furans	225	264		117.3
Total Hexa-Furans	262	309		117.9
Total Hepta-Furans	411	440		107.1
CAS: Columbia Analytical Services ng/Kg: Nanograms per kilogram (a) Provisional value for information purposes only B: Associated analyte detected in method blank J: Estimated value between estimated reporting limit and estimated detection limit				

Table 14: Dioxins and Furans NIST SRM1944 (CAS only)

Analyte	Reference Concentration (ng/Kg)	Reported Concentration CAS ng/Kg	Qualifier	Percent Recovery
2,3,7,8-TCDD	133	127		95.5
1,2,3,7,8-PeCDD	19	16.8		88.4
1,2,3,4,7,8-HxCDD	26	22.3		85.8
1,2,3,6,7,8-HxCDD	56	54.6		97.5
1,2,3,7,8,9-HxCDD	53	50.4		95.1
1,2,3,4,6,7,8-HpCDD	800	783	B	97.9
OCDD	5800	4980	B	85.9
2,3,7,8-TCDF	39 (a)	34.2		87.7
1,2,3,7,8-PeCDF	45	46.5		103.3
2,3,4,7,8-PeCDF	45	44.3		98.4
1,2,3,4,7,8-HxCDF	220	246	K	111.8
1,2,3,6,7,8-HxCDF	90	95.5		106.1
1,2,3,7,8,9-HxCDF	19	2.17	J	11.4
2,3,4,6,7,8-HxCDF	54	46.8	K	86.7
1,2,3,4,6,7,8-HpCDF	1000	1040	B	104.0
1,2,3,4,7,8,9-HpCDF	40	31		77.5
OCDF	1000	967	B	96.7
Total Tetra-Dioxins	250	280		112.0
Total Penta-Dioxins	190	238		125.3
Total Hexa-Dioxins	630	606		96.2
Total Hepta-Dioxins	1800	1890		105.0
Total Tetra-Furans	700	1160		165.7
Total Penta-Furans	740	829		112.0
Total Hexa-Furans	1000	992		99.2
Total Hepta-Furans	1500	1390		92.7
Total TEQ	250	234		93.6
CAS: Columbia Analytical Services ng/Kg: Nanograms per kilogram (a) Degrees of Freedom = 7 for this compound; most other compounds based on 14 labs (13 degrees of freedom) B: Associated analyte detected in method blank J: Estimated value between estimated reporting limit and estimated detection limit K: Estimated maximum possible concentration; ion abundance ratios are outside the QC limits.				

Table 15: Metals on Sewage Sludge CRM0180-050

Element	Reference Value (mg/Kg, dry wgt)	Reported Concentration Brooks Rand (mg/Kg, dry)	Brooks Rand Recovery (%)	Reported Concentration CAS (mg/Kg, dry)	CAS Recovery (%)	Prediction Interval (mg/Kg)
Aluminum	22400	28700	128.1	23000	102.7	17100 -23600
Antimony	(<2.0)	4.27	NA	1.96	NA	Not provided
Arsenic	6.63	7.7	116.1	5.2	78.4	0 -13.9
Barium	1100	1220	110.9	1290	117.3	817 - 1390
Beryllium	0.3	0.41	136.7	0.35	116.7	0 - 0.6
Boron	(25.80)	Not a target analyte	NA	Not a target analyte	NA	Not provided
Cadmium	5.57	4.93	88.5	6.7	120.3	3.34 - 7.81
Calcium	49100	50800	103.5	51100	104.1	46700 - 51400
Chromium	40.1	58.8	146.6	49.6	123.7	37.2 - 43.1
Cobalt	3.22	4.43	137.6	2.7	83.9	0.53 - 5.91
Copper	840	723	86.1	1030	122.6	650 - 1030
Iron	9900	15300	154.5	13200	133.3	5430 - 14400
Lead	126	138	109.5	143	113.5	105 -148
Magnesium	4300	4970	115.6	4950	115.1	2720 - 5890
Manganese	200	255	127.5	238	119.0	164 -235
Mercury	4.78	Reported using a separate PE sample				0.57 -8.99
Molybdenum	10.5	Not a target analyte	NA	Not a target analyte	NA	0.23 - 20.8
Nickel	20.4	27.3	133.8	16.4	80.4	13.0 - 27.8
Potassium	2660	3360	126.3	2770	104.1	1080 – 4240
Selenium	8.38	8.61	102.7	7.1	84.7	0.0 -19.1
Silicon	(609.00)	Not a target analyte	NA	Not a target analyte	NA	Not provided
Silver	72.1	80.7	111.9	82.9	115.0	45.5 - 98.8
Sodium	1000	952	95.2	1010	101.0	454 – 1550
Strontium	420	Not a target analyte				294 – 546
Thallium	(<1.0)	0.172	NA	0.29	NA	
Titanium	Not provided	480	NA	116	NA	Not provided
Vanadium	39.2	37.1	94.6	47.7	121.7	21.8 - 50.4
Zinc	1120	1190	106.3	1190	106.3	805 – 1440

CAS: Columbia Analytical Services

mg/Kg: Milligrams per kilogram

ug/Kg: Micrograms per kilogram

wgt: Weight

 Exceeds Acceptable limits.

Table 16: Mercury and Methyl Mercury Data – Estuarine Sediment ERM CC580

Element	Reference Value (mg/Kg, dry wgt)	Brooks Rand Reported mg/Kg, dry	Brooks Rand Percent Recovery (%)	CAS Reported mg/Kg, dry	CAS Percent Recovery (%)	2 x Uncertainty of Reference Value (mg/Kg)
Mercury	132	121	91.7	226	171.2	126 -138

Analyte	Reference Value (ug/Kg, dry wgt)	Brooks Rand Reported ug/Kg, dry	Brooks Rand Percent Recovery (%)	CAS Reported ug/Kg, dry	CAS Percent Recovery (%)	2 x Uncertainty of Reference Value (ug/Kg)
Methyl Mercury	75	63.1	84.1	64.7	86.3	67 -83

CAS: Columbia Analytical Services

mg/Kg: Milligrams per kilogram

ug/Kg: Micrograms per kilogram

wgt: Weight

Table 17: Hexavalent Chromium SQC012

	Reference Value mg/Kg	Reported Concentration CAS (mg/Kg)	Percent Recovery CAS (%)	Reported Concentration TestAmerica (mg/Kg)	Percent Recovery TestAmerica (%)	Acceptance Limits (mg/Kg)
Cr(VI)	89.28	89.6	100.4	92.4	103.5	22.2 -156

CAS: Columbia Analytical Services

mg/Kg: Milligrams per kilogram

Table 18: Butylins European Commission Certified Reference Material BCR-646

Analyte	Reference Concentration* (ug/Kg)	Reported Concentration - CAS	Percent Recovery (%)	Reported Concentration-TestAmerica (ug/Kg)	Percent Recovery (%)	Acceptance Limits (ug/Kg)
Tributyl tin	480	110	22.9	85	17.7	320 - 640
Dibutyl tin	770	150	19.5	200	26.0	590 - 950
Monobutyl tin	610	36	5.9	<50	<1	370 - 850

CAS: Columbia Analytical Services

ug/Kg: Micrograms per kilogram

*The supplier was contacted since the recoveries of both labs suggest that the reference concentration may be unreliable. The supplier provided a report from the European Commission that indicates a correction factor has been applied to the data and that recovery for Monobutyl tin was only 29%. The supplier has contacted the European Commission requesting more details on the recovery correction but has thus far not received a response.

AECOM Environment
 2 Technology Park Drive, Westford, MA 01866
 T 978.589.3000 F 978.589.3100 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
 PURPOSES ONLY

Table: 19: Wet Chemistry Parameters

Analyte	Reference Material	Reference Concentration (mg/Kg)	Reported Concentration - CAS (mg/Kg)	Percent Recovery (%)	Reported Concentration-TestAmerica (mg/Kg)	Percent Recovery (%)	Acceptance Limits (mg/Kg)
Ammonia-Nitrogen	Nutrients in Soil SQC014	1589	2040	128.4	1880	118.3	568 - 2610
Cyanide	Cyanide in Soil SQC011	68.58	Sample Lost	NA	1.2	1.8	5.26 - 132
Sulfide	Sulfide in Soil SQC102	121.31	25.3	20.9	6.02	5.0	0 - 348
Total Kjeldahl Nitrogen	Nutrients in Soil SQC014	4500	4380	97.3	4420	98.2	2480 - 6530
Total Phosphorus	Nutrients in Soil SQC014	3288	2560	77.9	1650	50.2	2060 - 4520
Total Organic Carbon	Nutrients in Soil SQC014	15000	15700	104.7	15900	106.0	8250 - 21800
CAS: Columbia Analytical Services							
mg/Kg: Milligrams per kilogram							
Exceeds acceptance limits							

AECOM Environment
 2 Technology Park Drive, Westford, MA 01866
 T 978.589.3000 F 978.589.3100 www.aecom.com

PRELIMINARY DRAFT – FOR DISCUSSION
 PURPOSES ONLY

Table 20: Grain Size NIST 8010 Material C

		NIST Reference Value (Material C)	CAS	TestAmerica
Sieve Size	Particle Size (um)	Mass Fraction (%)	Mass Fraction (%)	Mass Fraction (%)
4	4750		0	0
10	2000		0.02	0
20	850		0	0
30	595	0		
40	425	0	0.02	0.01
50	297	0.2		
60	250		1.42	1.59
70	210	5.7		
80	180			14.4
100	150	41.4		24.33
140	105	41.4	91.67	
200	75	10.4	6.39	58.75
>200	<75		0.52	
270	53	0.7		
325	44	0		
Pan		0.1		
Total Weight		130 g	132.3731g	129.96 g

NIST: National Institute of Standards and Technology

CAS: Columbia Analytical Services

g: grams

um: Micrometer

Table 21: Specific Gravity SQC066

Parameter	Reference Value	CAS Reported Value	TestAmerica Reported Value	Acceptance Limits
Specific Gravity	1.19 g/mL	1.20 g/ mL	1.207 g/mL	1.07 - 1.31

CAS: Columbia Analytical Services

g/mL: Grams per millilite

Appendix N

Data Validation Reports

Data Validation Summary Tables Attached

Data Validation Reports were submitted to USEPA on the following dates and are not included in this deliverable. Limited to updated and newly completed DVRs are included.

May 14, 2009

May 22, 2009

May 29, 2009

June 5, 2009

Appendix O

Data Results Summary

Appendix P

QC Results Summary

Appendix Q

Laboratory Electronic Data Deliverables and Data Reports

Analytical Data Packages were submitted as follows to USEPA and are not attached to this document

Addendum Monthly Report Sept 08
Received through September 30, 2008
Received through October 1-31, 2008
Received November 1-30, 2008
Received December 1-31, 2008
Received January 1-31, 2009
Received February 1-28, 2009
Received March 1-31, 2009
Received April 1-30, 2009

Appendix R

Extreme Value Evaluation

Appendix S

CSC Environmental Solutions Reports

Appendix T

Summary of Adjusted PCDD/PCDF data

Appendix T

Summary of Adjusted PCDD/PCDF data

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,4,6,7,8-HpCDD 35822-46-9 ng/kg					1,2,3,4,6,7,8-HpCDF 67562-39-4 ng/kg					1,2,3,4,7,8,9-HpCDF 55673-89-7 ng/kg					1,2,3,4,7,8-HxCDD 39227-28-6 ng/kg					1,2,3,4,7,8-HxCDF 70648-26-9 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0001-C1AS	211	J	271	JF	*1.284	1420	J	2030	JF	*1.430	33.9	J	33.9	J	ND or <QL	2.28	J	2.28	J	ND or <QL	466	J	583	JF	*1.251
08A-0001-C1BS	68.2	J	87.4	JF	*1.282	122	J	174	JF	*1.426	< 3.11	UJ	< 3.11	UJ	ND or <QL	0.947	J	0.947	J	ND or <QL	35.8	J	35.8	J	ND or <QL
08A-0001-C1CS	196	J	251	JF	*1.281	613	J	876	JF	*1.429	15	J	15	J	ND or <QL	2	J	2	J	ND or <QL	176	J	220	JF	*1.250
08A-0001-C1DS	530	J	679	JF	*1.281	842	J	1200	JF	*1.425	18.9	J	18.9	J	ND or <QL	4.93	J	4.93	J	ND or <QL	197	J	246	JF	*1.249
08A-0001-C1ES	287	J	368	JF	*1.282	591	J	845	JF	*1.430	13.7	J	13.7	J	ND or <QL	2.92	J	2.92	J	ND or <QL	172	J	215	JF	*1.250
08A-0001-C1FS	37	J	47.4	JF	*1.281	69.8	J	99.7	JF	*1.428	< 1.71	UJ	< 1.71	UJ	ND or <QL	0.526	J	0.526	J	ND or <QL	< 20.1	UJ	< 20.1	UJ	ND or <QL
08A-0001-C1FT	330	J	423	JF	*1.282	670	J	957	JF	*1.428	14.3	J	14.3	J	ND or <QL	3.51	J	3.51	J	ND or <QL	196	J	245	JF	*1.250
08A-0001-C1GS	404		518	F	*1.282	735		1050	F	*1.429	16.5	J	16.5	J	ND or <QL	4.2	J	4.2	J	ND or <QL	204		255	F	*1.250
08A-0001-C1HS	341		437	F	*1.282	566		809	F	*1.429	11.8	J	11.8	J	ND or <QL	3.85	J	3.85	J	ND or <QL	139		174	F	*1.252
08A-0001-C1IS	333		427	F	*1.282	778		1110	F	*1.427	15.8	J	15.8	J	ND or <QL	4.32	J	4.32	J	ND or <QL	202		252	F	*1.248
08A-0001-C1JS	336		431	F	*1.283	547		782	F	*1.430	10.2	J	10.2	J	ND or <QL	3.19	J	3.19	J	ND or <QL	137		171	F	*1.248
08A-0001-C1KS	401		514	F	*1.282	736		1050	F	*1.427	16.6	J	16.6	J	ND or <QL	4.02	J	4.02	J	ND or <QL	195		244	F	*1.251
08A-0002-C1AS	< 6.95	UJ	< 6.95	UJ	ND or <QL	< 3.10	UJ	< 3.10	UJ	ND or <QL	< 0.116	UJ	< 0.116	UJ	ND or <QL	< 0.113	UJ	< 0.113	UJ	ND or <QL	< 0.977	UJ	< 0.977	UJ	ND or <QL
08A-0002-C1BS	< 6.44	UJ	< 6.44	UJ	ND or <QL	< 1.02	UJ	< 1.02	UJ	ND or <QL	< 0.0714	UJ	< 0.0714	UJ	ND or <QL	< 0.105	UJ	< 0.105	UJ	ND or <QL	< 0.667	UJ	< 0.667	UJ	ND or <QL
08A-0002-C1CS	19	J	19	J	ND or <QL	< 3.12	U	< 3.12	U	ND or <QL	< 0.350	UJ	< 0.350	UJ	ND or <QL	0.259	J	0.259	J	ND or <QL	2.05	J	2.05	J	ND or <QL
08A-0002-C1DS	< 4.08	U	< 4.08	U	ND or <QL	< 0.262	UJ	< 0.262	UJ	ND or <QL	< 0.0469	UJ	< 0.0469	UJ	ND or <QL	< 0.0693	U	< 0.0693	U	ND or <QL	< 0.113	U	< 0.113	U	ND or <QL
08A-0002-C1ES	< 3.08	U	< 0.567	U	Split-Replaced	< 0.229	U	< 0.241	U	Split-Replaced	< 0.0691	UJ	< 0.232	U	Split-Replaced	< 0.0681	U	< 0.198	U	Split-Replaced	< 0.0281	U	< 0.171	U	Split-Replaced
08A-0002-C1FS	< 3.53	U	< 0.841	U	Split-Replaced	< 0.376	U	< 0.510	U	Split-Replaced	< 0.0524	UJ	< 0.365	U	Split-Replaced	< 0.0850	U	< 0.325	U	Split-Replaced	< 0.0275	U	< 0.315	U	Split-Replaced
08A-0003-C1AS	313	J	401	JF	*1.281	944	J	1350	JF	*1.430	16.7	J	16.7	J	ND or <QL	3.27	J	3.27	J	ND or <QL	266	J	333	JF	*1.252
08A-0003-C1BS	126	J	162	JF	*1.286	277	J	396	JF	*1.430	4.77	J	4.77	J	ND or <QL	1.33	J	1.33	J	ND or <QL	76.5	J	95.6	JF	*1.250
08A-0003-C1CS	29.7	J	38.1	JF	*1.283	16.3	J	16.3	J	ND or <QL	< 1.92	UJ	< 1.92	UJ	ND or <QL	< 0.414	UJ	< 0.414	UJ	ND or <QL	8	J	8	J	ND or <QL
08A-0003-C1DS	< 13.2	U	< 13.2	U	ND or <QL	< 3.00	UJ	< 3.00	UJ	ND or <QL	< 0.247	UJ	< 0.247	UJ	ND or <QL	< 0.346	U	< 0.346	U	ND or <QL	< 1.64	UJ	< 1.64	UJ	ND or <QL
08A-0003-C1ES	44.5		57	F	*1.281	6.65	J	6.65	J	ND or <QL	0.52	J	0.52	J	ND or <QL	0.653	J	0.653	J	ND or <QL	3.74	J	3.74	J	ND or <QL
08A-0003-C1FS	< 10.4	U	< 10.4	U	ND or <QL	< 0.563	U	< 0.563	U	ND or <QL	< 0.0411	UJ	< 0.0411	UJ	ND or <QL	0.147	J	0.147	J	ND or <QL	< 0.196	UJ	< 0.196	UJ	ND or <QL
08A-0003-C1GS	< 2.52	U	< 2.52	U	ND or <QL	< 0.0892	U	< 0.0892	U	ND or <QL	< 0.0930	UJ	< 0.0930	UJ	ND or <QL	< 0.0962	U	< 0.0962	U	ND or <QL	< 0.0539	U	< 0.0539	U	ND or <QL
08A-0003-C1HS	< 1.51	U	< 1.51	U	ND or <QL	< 0.169	UJ	< 0.169	UJ	ND or <QL	< 0.0506	UJ	< 0.0506	UJ	ND or <QL	< 0.0873	U	< 0.0873	U	ND or <QL	< 0.0277	U	< 0.0277	U	ND or <QL
08A-0004-C1AS	304	J	390	JF	*1.283	761	J	1090	JF	*1.432	17.7	J	17.7	J	ND or <QL	3.32	J	3.32	J	ND or <QL	205	J	256</		

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,4,6,7,8-HpCDD 35822-46-9 ng/kg					1,2,3,4,6,7,8-HpCDF 67562-39-4 ng/kg					1,2,3,4,7,8,9-HpCDF 55673-89-7 ng/kg					1,2,3,4,7,8-HxCDD 39227-28-6 ng/kg					1,2,3,4,7,8-HxCDF 70648-26-9 ng/kg				
	Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted		
	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]
08A-0006-C1ES	53.5		68.6	F	*1.282	21		30	F	*1.429	< 0.822	UJ	< 0.822	UJ	ND or <QL	0.697	J	0.697	J	ND or <QL	5.19	J	5.19	J	ND or <QL
08A-0006-C1FS	< 1.38	U	< 1.38	U	ND or <QL	< 0.470	UJ	< 0.470	UJ	ND or <QL	< 0.138	UJ	< 0.138	UJ	ND or <QL	< 0.0947	U	< 0.0947	U	ND or <QL	0.219	J	0.219	J	ND or <QL
08A-0006-C1GS	18.7	J	18.7	J	ND or <QL	25.3		36.2	F	*1.431	< 0.622	UJ	< 0.622	UJ	ND or <QL	< 0.150	U	< 0.150	U	ND or <QL	6.64	J	6.64	J	ND or <QL
08A-0006-C1HS	< 13.2	U	< 13.2	U	ND or <QL	15.3	J	15.3	J	ND or <QL	0.291	J	0.291	J	ND or <QL	< 0.107	U	< 0.107	U	ND or <QL	4.22	J	4.22	J	ND or <QL
08A-0006-C1IS	< 20.0	U	< 20.0	U	ND or <QL	21.1	J	21.1	J	ND or <QL	0.552	J	0.552	J	ND or <QL	< 0.127	U	< 0.127	U	ND or <QL	5.54	J	5.54	J	ND or <QL
08A-0006-C1JS	< 23.1	U	< 23.1	U	ND or <QL	< 7.66	U	< 7.66	U	ND or <QL	0.16	J	0.16	J	ND or <QL	0.261	J	0.261	J	ND or <QL	2.33	J	2.33	J	ND or <QL
08A-0006-C1KS	< 11.3	U	< 11.3	U	ND or <QL	11.5	J	11.5	J	ND or <QL	< 0.115	UJ	< 0.115	UJ	ND or <QL	< 0.118	U	< 0.118	U	ND or <QL	4.42	J	4.42	J	ND or <QL
08A-0007-C2AS	251	J	322	JF	*1.283	353	J	504	JF	*1.428	8.97	J	8.97	J	ND or <QL	2.91	J	2.91	J	ND or <QL	93.4	J	117	JF	*1.253
08A-0007-C2BS	336	J	431	JF	*1.283	540	J	772	JF	*1.430	10.9	J	10.9	J	ND or <QL	3.88	J	3.88	J	ND or <QL	147	J	184	JF	*1.252
08A-0007-C2CS	137	J	176	JF	*1.285	280	J	400	JF	*1.429	5.87	J	5.87	J	ND or <QL	1.38	J	1.38	J	ND or <QL	76.9	J	96.1	JF	*1.250
08A-0007-C2DS	< 9.02	U	< 9.02	U	ND or <QL	16.1	J	16.1	J	ND or <QL	< 0.168	UJ	< 0.168	UJ	ND or <QL	< 0.115	U	< 0.115	U	ND or <QL	4.43	J	4.43	J	ND or <QL
08A-0007-C2ES	< 0.881	UJ	< 0.881	UJ	ND or <QL	< 0.291	UJ	< 0.291	UJ	ND or <QL	< 0.125	UJ	< 0.125	UJ	ND or <QL	< 0.0807	U	< 0.0807	U	ND or <QL	< 0.0819	U	< 0.0819	U	ND or <QL
08A-0007-C2FS	< 0.942	U	< 0.942	U	ND or <QL	< 0.530	U	< 0.530	U	ND or <QL	< 0.0992	UJ	< 0.0992	UJ	ND or <QL	< 0.0936	U	< 0.0936	U	ND or <QL	0.256	J	0.256	J	ND or <QL
08A-0007-C2GS	< 14.9	U	< 14.9	U	ND or <QL	< 6.17	U	< 6.17	U	ND or <QL	< 0.177	UJ	< 0.177	UJ	ND or <QL	< 0.0959	U	< 0.0959	U	ND or <QL	0.993	J	0.993	J	ND or <QL
08A-0007-C2HS	< 10.1	U	< 10.1	U	ND or <QL	13.5	J	13.5	J	ND or <QL	0.366	J	0.366	J	ND or <QL	< 0.0963	U	< 0.0963	U	ND or <QL	2.95	J	2.95	J	ND or <QL
08A-0007-C2IS	< 3.19	U	< 3.19	U	ND or <QL	< 1.99	U	< 1.99	U	ND or <QL	< 0.0679	UJ	< 0.0679	UJ	ND or <QL	< 0.158	U	< 0.158	U	ND or <QL	0.645	J	0.645	J	ND or <QL
08A-0007-C2JS	< 1.33	UJ	< 1.33	UJ	ND or <QL	< 0.958	U	< 0.958	U	ND or <QL	< 0.111	UJ	< 0.111	UJ	ND or <QL	< 0.0699	U	< 0.0699	U	ND or <QL	0.321	J	0.321	J	ND or <QL
08A-0007-C2KS	< 1.19	U	< 1.19	U	ND or <QL	< 3.09	U	< 3.09	U	ND or <QL	0.214	J	0.214	J	ND or <QL	< 0.0843	U	< 0.0843	U	ND or <QL	0.503	J	0.503	J	ND or <QL
08A-0007-C2LS	< 2.86	U	< 2.86	U	ND or <QL	< 0.717	U	< 0.717	U	ND or <QL	< 0.0819	UJ	< 0.0819	UJ	ND or <QL	< 0.119	U	< 0.119	U	ND or <QL	< 0.249	U	< 0.249	U	ND or <QL
08A-0008-C1AS	280	J	359	JF	*1.282	384	J	549	JF	*1.430	11.2	J	11.2	J	ND or <QL	3.15	J	3.15	J	ND or <QL	112	J	140	JF	*1.250
08A-0008-C1BS	325	J	417	JF	*1.283	407	J	582	JF	*1.430	10.3	J	10.3	J	ND or <QL	3.8	J	3.8	J	ND or <QL	113	J	141	JF	*1.248
08A-0008-C1CS	384	J	492	JF	*1.281	518	J	740	JF	*1.429	13.2	J	13.2	J	ND or <QL	3.96	J	3.96	J	ND or <QL	139	J	174	JF	*1.252
08A-0008-C1DS	391	J	501	JF	*1.281	587	J	839	JF	*1.429	14	J	14	J	ND or <QL	4.21	J	4.21	J	ND or <QL	143	J	179	JF	*1.252
08A-0008-C1ES	513	J	658	JF	*1.283	665	J	950	JF	*1.429	15.6	J	15.6	J	ND or <QL	4.9	J	4.9	J	ND or <QL	179	J	224	JF	*1.251
08A-0008-C1ET	440	J	564	JF	*1.282	662	J	946	JF	*1.429	15.4	J	15.4	J	ND or <QL	4.39	J	4.39	J	ND or <QL	178	J	223	JF	*1.253
08A-0008-C1FS	428	J	549	JF	*1.283	673	J	962	JF	*1.429	13.3	J	13.3	J	ND or <QL	4.52	J	4.52	J	ND or <QL	168	J	210	JF	*1.250
08A-0008-C1GS	391		501	F	*1.281	703		1000	F	*1.422	14.8	J	14.8	J	ND or <QL	4.37	J	4.37	J	ND or <					

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,4,6,7,8-HpCDD 35822-46-9 ng/kg					1,2,3,4,6,7,8-HpCDF 67562-39-4 ng/kg					1,2,3,4,7,8,9-HpCDF 55673-89-7 ng/kg					1,2,3,4,7,8-HxCDD 39227-28-6 ng/kg					1,2,3,4,7,8-HxCDF 70648-26-9 ng/kg				
	Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted		
	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]
08A-0010-C2MS	226	J	290	JF	*1.283	143	J	204	JF	*1.427	4.45	J	4.45	J	ND or <QL	1.58	J	1.58	J	ND or <QL	39.7	J	49.6	JF	*1.249
08A-0011-C1AS	296	J	379	JF	*1.280	654	J	935	JF	*1.430	13.9	J	13.9	J	ND or <QL	3.04	J	3.04	J	ND or <QL	168	J	210	JF	*1.250
08A-0011-C1BS	< 11.3	U	< 11.3	U	ND or <QL	39.5		56.4	F	*1.428	0.94	J	0.94	J	ND or <QL	< 0.239	U	< 0.239	U	ND or <QL	9.34	J	9.34	J	ND or <QL
08A-0011-C1CS	< 5.60	U	< 5.60	U	ND or <QL	< 0.715	U	< 0.715	U	ND or <QL	< 0.163	UJ	< 0.163	UJ	ND or <QL	< 0.191	U	< 0.191	U	ND or <QL	< 0.128	U	< 0.128	U	ND or <QL
08A-0011-C1DS	< 2.81	U	< 2.81	U	ND or <QL	< 0.129	U	< 0.129	U	ND or <QL	< 0.125	UJ	< 0.125	UJ	ND or <QL	< 0.101	U	< 0.101	U	ND or <QL	< 0.0893	U	< 0.0893	U	ND or <QL
08A-0011-C1ES	< 4.52	UJ	< 4.52	UJ	ND or <QL	< 1.90	U	< 1.90	U	ND or <QL	< 0.135	UJ	< 0.135	UJ	ND or <QL	< 0.181	U	< 0.181	U	ND or <QL	< 0.150	U	< 0.150	U	ND or <QL
08A-0011-C1ET	< 3.00	U	< 3.00	U	ND or <QL	< 0.155	U	< 0.155	U	ND or <QL	< 0.154	UJ	< 0.154	UJ	ND or <QL	< 0.213	U	< 0.213	U	ND or <QL	< 0.133	U	< 0.133	U	ND or <QL
08A-0011-C1FS	51.6		66.2	F	*1.283	7.1	J	7.1	J	ND or <QL	< 0.346	UJ	< 0.346	UJ	ND or <QL	< 0.192	U	< 0.192	U	ND or <QL	< 0.172	U	< 0.172	U	ND or <QL
08A-0011-C1GS	< 8.46	U	< 8.46	U	ND or <QL	< 0.402	UJ	< 0.402	UJ	ND or <QL	< 0.205	UJ	< 0.205	UJ	ND or <QL	< 0.196	U	< 0.196	U	ND or <QL	< 0.0858	U	< 0.0858	U	ND or <QL
08A-0011-C1HS	21.1	J	21.1	J	ND or <QL	< 0.702	UJ	< 0.702	UJ	ND or <QL	< 0.127	UJ	< 0.127	UJ	ND or <QL	< 0.175	U	< 0.175	U	ND or <QL	< 0.0948	U	< 0.0948	U	ND or <QL
08A-0011-C1IS	29.6		37.9	F	*1.280	< 0.156	U	< 0.156	U	ND or <QL	< 0.155	UJ	< 0.155	UJ	ND or <QL	0.893	J	0.893	J	ND or <QL	< 0.152	U	< 0.152	U	ND or <QL
08A-0011-C1JS	17.9	J	17.9	J	ND or <QL	< 0.125	U	< 0.125	U	ND or <QL	< 0.116	UJ	< 0.116	UJ	ND or <QL	< 0.165	U	< 0.165	U	ND or <QL	< 0.0936	U	< 0.0936	U	ND or <QL
08A-0011-C1KS	23.3	J	23.3	J	ND or <QL	< 0.329	UJ	< 0.329	UJ	ND or <QL	< 0.129	UJ	< 0.129	UJ	ND or <QL	< 0.305	U	< 0.305	U	ND or <QL	< 0.179	U	< 0.179	U	ND or <QL
08A-0011-C1LS	22.4	J	22.4	J	ND or <QL	< 0.110	U	< 0.110	U	ND or <QL	< 0.107	UJ	< 0.107	UJ	ND or <QL	< 0.15	U	< 0.15	U	ND or <QL	< 0.121	U	< 0.121	U	ND or <QL
08A-0011-C1MS	19.4		24.9	F	*1.284	< 0.284	U	< 0.284	U	ND or <QL	< 0.116	UJ	< 0.116	UJ	ND or <QL	< 0.174	U	< 0.174	U	ND or <QL	< 0.0722	U	< 0.0722	U	ND or <QL
08A-0012-C1AS	262	J	336	JF	*1.282	361	J	516	JF	*1.429	10.6	J	10.6	J	ND or <QL	3.12	J	3.12	J	ND or <QL	130	J	163	JF	*1.254
08A-0012-C1BS	449	J	576	JF	*1.283	264	J	377	JF	*1.428	8.2	J	8.2	J	ND or <QL	2.4	J	2.4	J	ND or <QL	65	J	81.3	JF	*1.251
08A-0012-C1CS	88.8	J	114	JF	*1.284	139	J	199	JF	*1.432	2.74	J	2.74	J	ND or <QL	0.969	J	0.969	J	ND or <QL	38.5	J	48.1	JF	*1.249
08A-0012-C1DS	538	J	690	JF	*1.283	721	J	1030	JF	*1.429	16.5	J	16.5	J	ND or <QL	6.03	J	6.03	J	ND or <QL	193	J	241	JF	*1.249
08A-0012-C1ES	378	J	485	JF	*1.283	707	J	1010	JF	*1.429	14.9	J	14.9	J	ND or <QL	4.26	J	4.26	J	ND or <QL	188	J	235	JF	*1.250
08A-0012-C1FS	217	J	278	JF	*1.281	248	J	354	JF	*1.427	5.48	J	5.48	J	ND or <QL	< 1.58	UJ	< 1.58	UJ	ND or <QL	64.2	J	80.3	JF	*1.251
08A-0012-C1FT	411	J	527	JF	*1.282	559	J	799	JF	*1.429	12.5	J	12.5	J	ND or <QL	3.64	J	3.64	J	ND or <QL	133	J	166	JF	*1.248
08A-0012-C1GS	683	J	876	JF	*1.283	1010	J	1440	JF	*1.426	18.7	J	18.7	J	ND or <QL	3.53	J	3.53	J	ND or <QL	278	J	348	JF	*1.252
08A-0012-C1HS	89.7	J	115	JF	*1.282	122	J	174	JF	*1.426	< 2.64	UJ	< 2.64	UJ	ND or <QL	< 0.862	UJ	< 0.862	UJ	ND or <QL	34.1	J	42.6	JF	*1.249
08A-0012-C1IS	806		1030	F	*1.278	844		1210	F	*1.434	20.8	J	32	JF	*1.538	5.7	J	5.7	J	ND or <QL	223	J	279	JF	*1.251
08A-0012-C1JS	373	J	478	JF	*1.282	376	J	537	JF	*1.428	8.65	J	8.65	J	ND or <QL	< 2.66	UJ	< 2.66	UJ	ND or <QL	86.3	J	108	JF	*1.251
08A-0013-C2AS	362	J	464	JF	*1.282	353	J	504	JF	*1.428															

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,4,6,7,8-HpCDD 35822-46-9 ng/kg					1,2,3,4,6,7,8-HpCDF 67562-39-4 ng/kg					1,2,3,4,7,8,9-HpCDF 55673-89-7 ng/kg					1,2,3,4,7,8-HxCDD 39227-28-6 ng/kg					1,2,3,4,7,8-HxCDF 70648-26-9 ng/kg				
	Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted		
	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]
08A-0015-C2AS	279	J	358	JF	*1.283	377	J	539	JF	*1.430	10.1	J	10.1	J	ND or <QL	3.23	J	3.23	J	ND or <QL	113	J	141	JF	*1.248
08A-0015-C2BS	264	J	338	JF	*1.280	267	J	382	JF	*1.431	6.42	J	6.42	J	ND or <QL	2.71	J	2.71	J	ND or <QL	76.1	J	95.1	JF	*1.250
08A-0015-C2CS	590	J	756	JF	*1.281	558	J	797	JF	*1.428	14.4	J	14.4	J	ND or <QL	6.22	J	6.22	J	ND or <QL	148	J	185	JF	*1.250
08A-0015-C2DS	995	J	1280	JF	*1.286	740	J	1060	JF	*1.432	17.3	J	17.3	J	ND or <QL	7.08	J	7.08	J	ND or <QL	201	J	251	JF	*1.249
08A-0015-C2ES	326		418	F	*1.282	377		539	F	*1.430	9.46	J	9.46	J	ND or <QL	2.71	J	2.71	J	ND or <QL	128		160	F	*1.250
08A-0015-C2FS	540		692	F	*1.281	439		627	F	*1.428	13	J	13	J	ND or <QL	4.9	J	4.9	J	ND or <QL	199		249	F	*1.251
08A-0015-C2GS	41.5		53.2	F	*1.282	47.9		68.4	F	*1.428	1.67	J	1.67	J	ND or <QL	0.655	J	0.655	J	ND or <QL	10.9	J	10.9	J	ND or <QL
08A-0015-C2HS	< 3.16	U	< 3.16	U	ND or <QL	< 1.06	U	< 1.06	U	ND or <QL	< 0.100	UJ	< 0.100	UJ	ND or <QL	< 0.0905	U	< 0.0905	U	ND or <QL	< 0.233	UJ	< 0.233	UJ	ND or <QL
08A-0015-C2IS	< 8.56	U	< 8.56	U	ND or <QL	< 0.253	U	< 0.253	U	ND or <QL	< 0.217	UJ	< 0.217	UJ	ND or <QL	< 0.245	U	< 0.245	U	ND or <QL	< 0.199	U	< 0.199	U	ND or <QL
08A-0015-C2JS	< 12.2	U	< 12.2	U	ND or <QL	< 0.175	U	< 0.175	U	ND or <QL	< 0.168	UJ	< 0.168	UJ	ND or <QL	< 0.183	U	< 0.183	U	ND or <QL	< 0.125	U	< 0.125	U	ND or <QL
08A-0016-C1AS	237	J	304	JF	*1.283	209	J	299	JF	*1.431	6.28	J	6.28	J	ND or <QL	2.61	J	2.61	J	ND or <QL	50.2	J	62.8	JF	*1.251
08A-0016-C1BS	701	J	899	JF	*1.282	595	J	850	JF	*1.429	16.6	J	16.6	J	ND or <QL	7.84	J	7.84	J	ND or <QL	139	J	174	JF	*1.252
08A-0016-C1CS	531	J	681	JF	*1.282	427	J	610	JF	*1.429	11.1	J	11.1	J	ND or <QL	5.9	J	5.9	J	ND or <QL	108	J	135	JF	*1.250
08A-0016-C1DS	640	J	820	JF	*1.281	474	J	677	JF	*1.428	13.3	J	13.3	J	ND or <QL	6.98	J	6.98	J	ND or <QL	106	J	133	JF	*1.255
08A-0016-C1ES	749	J	960	JF	*1.282	626	J	895	JF	*1.430	18	J	18	J	ND or <QL	7.14	J	7.14	J	ND or <QL	158	J	198	JF	*1.253
08A-0016-C1ET	564	J	723	JF	*1.282	611	J	873	JF	*1.429	14.6	J	14.6	J	ND or <QL	6.32	J	6.32	J	ND or <QL	138	J	173	JF	*1.254
08A-0016-C1FS	574	J	736	JF	*1.282	618	J	883	JF	*1.429	14.6	J	14.6	J	ND or <QL	7.34	J	7.34	J	ND or <QL	150	J	188	JF	*1.253
08A-0016-C1GS	722	J	926	JF	*1.283	1060	J	1510	JF	*1.425	21.6	J	21.6	J	ND or <QL	8.06	J	8.06	J	ND or <QL	261	J	326	JF	*1.249
08A-0016-C1HS	102	J	131	JF	*1.284	140	J	200	JF	*1.429	3.97	J	3.97	J	ND or <QL	1.18	J	1.18	J	ND or <QL	42.1	J	52.6	JF	*1.249
08A-0016-C1IS	745	J	955	JF	*1.282	1230	J	1760	JF	*1.431	23.6	J	23.6	J	ND or <QL	6.32	J	6.32	J	ND or <QL	297	J	371	JF	*1.249
08A-0016-C1JS	1210	J	1550	JF	*1.281	799	J	1140	JF	*1.427	22.5	J	22.5	J	ND or <QL	9.02	J	9.02	J	ND or <QL	191	J	239	JF	*1.251
08A-0016-C1KS	1680	J	2150	JF	*1.280	1090	J	1560	JF	*1.431	28.6	J	28.6	J	ND or <QL	10.5	J	10.5	J	ND or <QL	270	J	338	JF	*1.252
08A-0016-C1LS	1590	J	2040	JF	*1.283	1300	J	1860	JF	*1.431	35.4	J	54.4	JF	*1.537	12	J	12	J	ND or <QL	306	J	383	JF	*1.252
08A-0017-C1AS	473	J	606	JF	*1.281	644	J	920	JF	*1.429	15.3	J	15.3	J	ND or <QL	3.9	J	3.9	J	ND or <QL	175	J	219	JF	*1.251
08A-0017-C1AT	446	J	572	JF	*1.283	626	J	895	JF	*1.430	14.3	J	14.3	J	ND or <QL	4.61	J	4.61	J	ND or <QL	171	J	214	JF	*1.251
08A-0017-C1BS	550	J	569	B	Split-Replaced	952	J	1010	B	Split-Replaced	20.5	J	29.1	B	Split-Replaced	6.46	J	7.76	BJ	Split-Replaced	243	J	279	B	Split-Replaced
08A-0017-C1CS	736	J	944	JF	*1.283	1380	J	1970	JF	*1.428	28.2	J	28.2	J	ND or <QL	6.75	J	6.75	J	ND or <QL	390	J	488	JF	*1.251
08A-0017-C1DS	577	J	613	B	Split-Replaced	1320	J	1430	B	Split-Replaced	26.5	J	39.5	B	Split-Replaced	5.47	J	9.03	BJ	Split-Replaced	373	J	372	B	Split-Replaced
08A-0017-C1ES	644	J	826	JF	*1.283	1450	J	2070	JF	*1.428	24.8	J	24.8	J	ND or <QL	5.9	J	5.9	J	ND or <QL	390	J	488	JF	*1.251
08A-0017-C1FS	788	J	1010	JF	*1.282	2260	J	3230	JF	*1.429	36.2	J	55.7	JF	*1.539	8.22	J	8.22	J	ND or <QL	584	J	730	JF	*1.250
08A-0017-C1GS	742	J	951	JF	*1.282	1490	J	2130	JF	*1.430	29.8	J	45.8	JF	*1.537	5.94	J	5.94	J	ND or <QL	434	J	542	JF	*1.249
08A-0017-C1HS	1350	J	1730	JF	*1.281	2910	J	4160	JF	*1.430	54.1	J	83.2	JF	*1.538	12	J	12	J	ND or <QL	740	J	925	JF	*1.250
08A-0017-C1IS	1580	J	2030	JF	*1.285	3330	J	4760	JF	*1.429	65.9	J	101	JF	*1.533	13.1	J	13.1	J	ND or <QL	845	J	1060	JF	*1.254
08A-0017-C1JS	1110	J	1420	JF	*1.279	1910	J	2730	JF	*1.429	43.5	J	66.9	JF	*1.538	8.81	J	8.81	J	ND or <QL	491	J	614	JF	*1.251
08A-0017-C1KS	31.9		40.9	F	*1.282	22.3	J	22.3	J	ND or <QL	1.71	J	1.71	J	ND or <QL	0.78	J	0.78	J	ND or <QL	9.7	J	9.7	J	ND or <QL
08A-0017-C1LS	< 28.5	U	< 28.5	U	ND or <QL	< 9.17	U	< 9.17	U	ND or <QL	< 0.808	U	< 0.808	U	ND or <QL	< 0.243	U	< 0.243	U	ND or <QL	1.33	J	1.33	J	ND or <QL
08A-0017-C1MS	40.7		52.2	F	*1.283	47		67.2	F	*1.430	5.73	J	5.73	J	ND or <QL	< 1.00	U	< 1.00	U	ND or <QL	19.5	J	19.5	J	ND or <QL
08A-0017-C1NS	< 3.95	U	< 3.95	U	ND or <QL	4.6	J	4.6	J	ND or <QL	< 0.108	UJ	< 0.108	UJ	ND or <QL	< 0.0704	U	< 0.0704	U	ND or <QL	<				

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,4,6,7,8-HpCDD 35822-46-9 ng/kg					1,2,3,4,6,7,8-HpCDF 67562-39-4 ng/kg					1,2,3,4,7,8,9-HpCDF 55673-89-7 ng/kg					1,2,3,4,7,8-HxCDD 39227-28-6 ng/kg					1,2,3,4,7,8-HxCDF 70648-26-9 ng/kg				
	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0019-D1AS	469	J	601	JF	*1.281	458	J	654	JF	*1.428	11.6	J	11.6	J	ND or <QL	< 4.69	UJ	< 4.69	UJ	ND or <QL	122	J	152	JF	*1.246
08A-0019-D1BS	308	J	395	JF	*1.282	274	J	392	JF	*1.431	6.96	J	6.96	J	ND or <QL	< 2.49	UJ	< 2.49	UJ	ND or <QL	78.2	J	97.8	JF	*1.251
08A-0019-D1CS	336	J	431	JF	*1.283	583	J	833	JF	*1.429	13.8	J	13.8	J	ND or <QL	2.65	J	2.65	J	ND or <QL	167	J	209	JF	*1.251
08A-0019-D1DS	449	J	576	JF	*1.283	518	J	740	JF	*1.429	11.6	J	11.6	J	ND or <QL	4.22	J	4.22	J	ND or <QL	151	J	189	JF	*1.252
08A-0019-D1ES	1050	J	1350	JF	*1.286	873	J	1250	JF	*1.432	20.5	J	20.5	J	ND or <QL	6.36	J	6.36	J	ND or <QL	237	J	296	JF	*1.249
08A-0020-C2AS	276	J	354	JF	*1.283	398	J	569	JF	*1.430	10.9	J	10.9	J	ND or <QL	3.53	J	3.53	J	ND or <QL	114	J	143	JF	*1.254
08A-0020-C2BS	477	J	612	JF	*1.283	819	J	1170	JF	*1.429	19	J	19	J	ND or <QL	4.43	J	4.43	J	ND or <QL	231	J	289	JF	*1.251
08A-0020-C2BT	143	J	183	JF	*1.280	302	J	432	JF	*1.430	6.74	J	6.74	J	ND or <QL	1.63	J	1.63	J	ND or <QL	82.9	J	104	JF	*1.255
08A-0020-C2CS	603	J	1180	B	Split-Replaced	1230	J	1750	B	Split-Replaced	22.6	J	63.4	B	Split-Replaced	3.67	J	10.1	BJ	Split-Replaced	268	J	438	B	Split-Replaced
08A-0020-C2DS	543	J	2180	B	Split-Replaced	666	J	2550	B	Split-Replaced	19.8	J	100	B	Split-Replaced	5.28	J	27.2	B	Split-Replaced	175	J	615	B	Split-Replaced
08A-0020-C2ES	1000	J	2820	B	Split-Replaced	2360	J	5270	B	Split-Replaced	56.8	J	212	B	Split-Replaced	8.27	J	27.9	B	Split-Replaced	517	J	1220	B	Split-Replaced
08A-0020-C2FS	293	J	376	JF	*1.283	1240	J	1770	JF	*1.427	23.7	J	23.7	J	ND or <QL	2.71	J	2.71	J	ND or <QL	332	J	415	JF	*1.250
08A-0020-C2FT	725	J	929	JF	*1.281	3770	J	5390	JF	*1.430	83.3	J	128	JF	*1.537	9.16	J	9.16	J	ND or <QL	989	J	1240	JF	*1.254
08A-0020-C2GS	33.8	J	43.3	JF	*1.281	80.1	J	114	JF	*1.423	5.69	J	5.69	J	ND or <QL	0.888	J	0.888	J	ND or <QL	18.1	J	18.1	J	ND or <QL
08A-0020-C2HS	< 12.3	U	< 12.3	U	ND or <QL	6.85	J	6.85	J	ND or <QL	< 0.836	UJ	< 0.836	UJ	ND or <QL	0.434	J	0.434	J	ND or <QL	3.39	J	3.39	J	ND or <QL
08A-0021-C1AS	365	J	468	JF	*1.282	759	J	1080	JF	*1.423	14.2	J	14.2	J	ND or <QL	4.49	J	4.49	J	ND or <QL	168	J	210	JF	*1.250
08A-0021-C1BS	597		765	F	*1.281	765		1090	F	*1.425	21.7	J	21.7	J	ND or <QL	3.44	J	3.44	J	ND or <QL	186		233	F	*1.253
08A-0021-C1CS	550		705	F	*1.282	858	J	1230	JF	*1.434	18.5	J	18.5	J	ND or <QL	4.07	J	4.07	J	ND or <QL	205		256	F	*1.249
08A-0021-C1DS	1380	J	1770	JF	*1.283	1120	J	1600	JF	*1.429	34.2	J	34.2	J	ND or <QL	8.91	J	8.91	J	ND or <QL	285	J	356	JF	*1.249
08A-0021-C1ES	1950	J	2500	JF	*1.282	4610	J	6590	JF	*1.430	141	J	217	JF	*1.539	18.5	J	18.5	J	ND or <QL	1220	J	1520	JF	*1.246
08A-0021-C1FS	1870	J	2400	JF	*1.283	18300	J	26200	JF	*1.432	287	J	441	JF	*1.537	19.4	J	19.4	J	ND or <QL	3830	J	4790	JF	*1.251
08A-0021-C1FT	1680	J	2150	JF	*1.280	22700	J	32400	JF	*1.427	233	J	358	JF	*1.536	18.3	J	18.3	J	ND or <QL	4090	J	5110	JF	*1.249
08A-0021-C1GS	6430	J	8240	JF	*1.281	5010	J	7160	JF	*1.429	165	J	254	JF	*1.539	216	J	216	J	None	1100	J	1370	JF	*1.245
08A-0021-C1HS	430		551	F	*1.281	1730		2470	F	*1.428	24.2	J	24.2	J	ND or <QL	3.67	J	3.67	J	ND or <QL	182		227	F	*1.247
08A-0022-C1AS	489	J	627	JF	*1.282	652	J	932	JF	*1.429	17.5	J	17.5	J	ND or <QL	5.61	J	5.61	J	ND or <QL	180	J	225	JF	*1.250
08A-0022-C1BS	658	J	844	JF	*1.283	1830	J	2620	JF	*1.432	35.1	J	54	JF	*1.538	7.2	J	7.2	J	ND or <QL	510	J	638	JF	*1.251
08A-0022-C1CS	2100	J	2690	JF	*1.281	2070	J	2960	JF	*1.430	54.8	J	84.3	JF	*1.538	27.2	J	27.2	J	ND or <QL	536	J	670	JF	*1.250
08A-0022-C1DS	705		904	F	*1.282	2250		3220	F	*1.431	72.4	J	111	JF	*1.533	9.06	J	9.06	J	ND or <QL	883		1100	F	*1.246
08A-0022-C1ES	41.2		52.8	F	*1.282	9.27	J	9.27	J	ND or <QL	< 0.591	UJ	< 0.591	UJ	ND or <QL	0.458	J	0.458	J	ND or <QL	4.71	J	4.71	J	ND or <QL
08A-0022-C1FS	33.7		43.2	F	*1.282	< 1.76	U	< 1.76	U	ND or <QL	< 0.254	UJ	< 0.254	UJ	ND or <QL	< 0.305	U	< 0.305	U	ND or <QL	0.519	J	0.519	J	ND or <QL
08A-0022-C1GS	35.7		45.8	F	*1.283	< 0.956	U	< 0.956	U	ND or <QL	< 0.205	UJ	< 0.205	UJ	ND or <QL	0.384	J	0.384	J	ND or <QL	< 0.127	U	< 0.127	U	ND or <QL
08A-0022-C1HS	38.6		49.5	F	*1.282	< 4.46	U	< 4.46	U	ND or <QL	1.97	J	1.97	J	ND or <QL	2.22	J	2.22	J	ND or <QL	2.7	J	2.7	J	ND or <QL
08A-0022-C1IS	73.5		94.2	F	*1.282	< 2.11	U	< 2.11	U	ND or <QL	< 0.169	UJ	< 0.169	UJ	ND or <QL	0.541	J	0.541	J	ND or <QL	< 0.258	U	< 0.258	U	ND or <QL
08A-0022-C1JS	< 5.71	U	< 5.71	U	ND or <QL	< 1.07	U	< 1.07	U	ND or <QL	< 0.224	UJ	< 0.224	UJ	ND or <QL	< 0.0717	U	< 0.0717	U	ND or <QL	< 0.197	U	< 0.197	U	ND or <QL
08A-0022-D2AS	636	J	815	JF	*1.281	606	J	866	JF	*1.429	16.4	J	16.4	J	ND or <QL	7	J	7	J	ND or <QL	158	J	198	JF	*1.253
08A-0022-D2BS	216	J	277	JF	*1.282	310	J	443	JF	*1.429	8.45	J	8.45	J	ND or <QL	2.66	J	2.66	J	ND or <QL	80.6	J	101	JF	*1.253
08A-0022-D2CS	337	J	432	JF	*1.282	439	J	627	JF	*1.428	9.59	J	9.59	J	ND or <QL	4.17	J	4.17	J	ND or <QL	125	J	156	JF	*1.248
08A-0022-D2DS	681	J	873	JF	*1.282	1930	J	2760	JF	*1.430	32.7	J	32.7	J	ND or <QL	8.09	J	8.09	J	ND or <QL	510	J	638	JF	*1.251
08A-0022-D2ES	1380	J	1770	JF	*1.283	5800	J	8290	JF	*1.429	101	J	155	JF	*1.535	10.8	J	10.8	J	ND or <QL	856	J	1070	JF	*1.250
08A-0023-C2AS	336	J	431	JF	*1.283	328	J	469	JF	*1.430	8.67	J	8.67	J	ND or <QL	4.16	J	4.16	J	ND or <QL	93.2	J	117	JF	*1.255
08A-0023-C2BS	572	J	733	JF	*1.281	759	J	1080	JF	*1.423	16.4	J	16.4	J	ND or <QL	5.08	J	5.08	J	ND or <QL	200	J	250	JF	*1.250
08A-0023-C2CS	754	J	967	JF	*1.282	951	J	1360	JF	*1.430	19.1	J	19.1	J	ND or <QL	5.45	J	5.45	J	ND or <QL	234	J	292	JF	*1.248
08A-0023-C2DS	889	J	1140	JF	*1.282	797	J	1140	JF	*1.430	20.4	J	20.4	J	ND or <QL	5.94	J	5.94	J	ND or <QL	210	J	263	JF	*1.252
08A-0023-C2ES	1200	J	1540	JF	*1.283	1190	J	1700	JF	*1.429	32.6	J	50.1	JF	*1.537	8.75	J	8.75	J	ND or <QL	336	J	420	JF	*1.250
08A-0023-C2FS	1000	J	1280	JF	*1.280	1960	J	2800	JF	*1.429	36.5	J	56.1	JF	*1.537	7.99	J	7.99	J	ND or <QL	282	J	352	JF	*1.248
08A-0023-C2GS	682	J	874	JF	*1.282	2800	J	4000	JF	*1.429	61.4	J	94.4	JF	*1.537	5.96	J	5.96	J	ND or <QL	1010	J	1260	JF	*1.248
08A-0023-C2HS	1780	J	2280	JF	*1.281	5740	J	8200	JF	*1.429	132	J	203	JF	*1.538	23	J	23	J	ND or <QL	1540	J	1920	JF	*1.247
08A-0023-C2IS	497	J	637	JF	*1.282	1990	J	2840	JF	*1.427	48.4	J	74.4	JF	*1.537	3.58	J	3.58	J	ND or <QL	397	J	496	JF	*1.249
08A-0023-C2JS	41.2		52.8	F	*1.282	52		74.3	F	*1.429	4.4	J	4.4	J	ND or <QL	1.95	J	1.95	J	ND or <QL	16.6	J	16.6	J	ND or <QL
08A-0024-C1AS	468	J	600	JF	*1.282	541	J	773	JF	*1.429	14.8	J	14.8	J	ND or <QL	5.72	J	5.72	J	ND or <QL	157	J	196	JF	*1.248
08A-0024-C1BS	1390	J	1780	JF	*1.281	1180	J	1690	JF	*1.432	36.8	J	36.8	J	ND or <QL	10.5	J	10.5	J	ND or <QL	327	J	409	JF	*1.251
08A-0024-C1CS	1630	J	2090	JF	*1.282	1750	J	2500	JF	*1.429	53.2	J	81.8	JF	*1.538	15.7	J	15.7	J	ND or <QL	515	J	644	JF	*1.250
08A-0024-C1DS	1500	J	1920	JF	*1.280	3720	J	5320	JF	*1.430	77.5	J	119	JF	*1.535	15.7	J	15.7	J	ND or <QL	1170	J	1460	JF	*1.248

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,4,6,7,8-HpCDD 35822-46-9 ng/kg					1,2,3,4,6,7,8-HpCDF 67562-39-4 ng/kg					1,2,3,4,7,8,9-HpCDF 55673-89-7 ng/kg					1,2,3,4,7,8-HxCDD 39227-28-6 ng/kg					1,2,3,4,7,8-HxCDF 70648-26-9 ng/kg				
	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0024-C1ES	950	J	1220	JF	*1.284	4900	J	7000	JF	*1.429	110	J	169	JF	*1.536	12.9	J	12.9	J	ND or <QL	1420	J	1770	JF	*1.246
08A-0024-C1FS	1150	J	1470	JF	*1.278	6360	J	9090	JF	*1.429	120	J	185	JF	*1.542	14.4	J	14.4	J	ND or <QL	1700	J	2120	JF	*1.247
08A-0024-C1FT	1310	J	1680	JF	*1.282	5890	J	8420	JF	*1.430	117	J	180	JF	*1.538	18.7	J	18.7	J	ND or <QL	1690	J	2110	JF	*1.249
08A-0024-C1GS	119		153	F	*1.286	336		480	F	*1.429	8.76	J	8.76	J	ND or <QL	1.73	J	1.73	J	ND or <QL	69.3		86.6	F	*1.250
08A-0024-C1HS	19.8		25.4	F	*1.283	20.8		29.7	F	*1.428	1.38	J	1.38	J	ND or <QL	< 0.154	U	< 0.154	U	ND or <QL	8.74	J	8.74	J	ND or <QL
08A-0025-C1AS	76	J	97.4	JF	*1.282	70.4	J	101	JF	*1.435	< 1.98	UJ	< 1.98	UJ	ND or <QL	1.3	J	1.3	J	ND or <QL	14.7	J	14.7	J	ND or <QL
08A-0025-C1BS	127	J	163	JF	*1.283	103	J	147	JF	*1.427	< 2.66	UJ	< 2.66	UJ	ND or <QL	1.34	J	1.34	J	ND or <QL	30.1	J	37.6	JF	*1.249
08A-0025-C1CS	234	J	300	JF	*1.282	248	J	354	JF	*1.427	6.25	J	6.25	J	ND or <QL	1.58	J	1.58	J	ND or <QL	49.4	J	61.8	JF	*1.251
08A-0025-C1DS	333		427	F	*1.282	311		444	F	*1.428	8.92	J	8.92	J	ND or <QL	2.65	J	2.65	J	ND or <QL	67.3		84.1	F	*1.250
08A-0025-C1ES	1870	J	2400	JF	*1.283	1600	J	2290	JF	*1.431	53.6	J	82.4	JF	*1.537	15.3	J	15.3	J	ND or <QL	416	J	520	JF	*1.250
08A-0025-C1ET	1970	J	2530	JF	*1.284	1650	J	2360	JF	*1.430	53.5	J	82.3	JF	*1.538	13.9	J	13.9	J	ND or <QL	419	J	524	JF	*1.251
08A-0025-C1FS	1430	J	1830	JF	*1.280	3600	J	5140	JF	*1.428	116	J	178	JF	*1.534	19.4	J	19.4	J	ND or <QL	1090	J	1360	JF	*1.248
08A-0025-C1GS	51.4		65.9	F	*1.282	69.5		99.3	F	*1.429	6.65	J	6.65	J	ND or <QL	1.27	J	1.27	J	ND or <QL	27.8		34.8	F	*1.252
08A-0026-C1AS	407	J	522	JF	*1.283	584	J	835	JF	*1.430	16.3	J	16.3	J	ND or <QL	4.95	J	4.95	J	ND or <QL	163	J	204	JF	*1.252
08A-0026-C1BS	719	J	922	JF	*1.282	2150	J	3070	JF	*1.428	36.8	J	56.6	JF	*1.538	6.88	J	6.88	J	ND or <QL	442	J	553	JF	*1.251
08A-0026-C1CS	272	J	349	JF	*1.283	115	J	164	JF	*1.426	3.63	J	3.63	J	ND or <QL	1.15	J	1.15	J	ND or <QL	30.5	J	38.1	JF	*1.249
08A-0026-C1DS	11.8	J	11.8	J	ND or <QL	< 1.72	U	< 1.72	U	ND or <QL	< 0.141	UJ	< 0.141	UJ	ND or <QL	< 0.0742	U	< 0.0742	U	ND or <QL	0.177	J	0.177	J	ND or <QL
08A-0026-C1ES	< 7.86	U	34.9	B	Split-Replaced	< 0.223	UJ	< 0.603	U	Split-Replaced	< 0.0893	UJ	< 0.264	U	Split-Replaced	0.11	J	< 0.817	U	Split-Replaced	0.122	J	< 0.222	U	Split-Replaced
08A-0027-C1AS	111	J	142	JF	*1.279	146	J	209	JF	*1.432	3.06	J	3.06	J	ND or <QL	1.59	J	1.59	J	ND or <QL	35.1	J	35.1	J	ND or <QL
08A-0027-C1BS	171	J	219	JF	*1.281	171	J	244	JF	*1.427	4.5	J	4.5	J	ND or <QL	2.16	J	2.16	J	ND or <QL	43.8	J	54.8	JF	*1.251
08A-0027-C1CS	79.8	J	102	JF	*1.278	126	J	180	JF	*1.429	2.72	J	2.72	J	ND or <QL	0.906	J	0.906	J	ND or <QL	38.2	J	47.8	JF	*1.251
08A-0027-C1DS	667	J	855	JF	*1.282	1010	J	1440	JF	*1.426	22	J	22	J	ND or <QL	6.54	J	6.54	J	ND or <QL	252	J	315	JF	*1.250
08A-0027-C1ES	215	J	276	JF	*1.284	200	J	286	JF	*1.430	5.02	J	5.02	J	ND or <QL	1.9	J	1.9	J	ND or <QL	52.5	J	65.6	JF	*1.250
08A-0027-C1FS	1070	J	1370	JF	*1.280	698	J	997	JF	*1.428	20.3	J	20.3	J	ND or <QL	6.83	J	6.83	J	ND or <QL	178	J	223	JF	*1.253
08A-0027-C1GS	1810		2320	F	*1.282	1950		2790	F	*1.431	54.4	J	83.7	JF	*1.539	14.3	J	14.3	J	ND or <QL	535		669	F	*1.250
08A-0027-C1HS	428	J	549	JF	*1.283	996	J	1420	JF	*1.426	25.7	J	39.5	JF	*1.537	4.57	J	4.57	J	ND or <QL	323	J	404	JF	*1.251
08A-0027-C1IS	435		558	F	*1.283	1230		1760	F	*1.431	23.5	J	36.1	JF	*1.536	4.66	J	4.66	J	ND or <QL	279		349	F	*1.251
08A-0028-C2AS	381	J	488	JF	*1.281	678	J	969	JF	*1.429	18.3	J	18.3	J	ND or <QL	4.45	J	4.45	J	ND or <QL	199	J	249	JF	*1.251
08A-0028-C2BS	359	J	460	JF	*1.281	381	J	544	JF	*1.428	10.3	J	10.3	J	ND or <QL	3.95	J	3.95	J	ND or <QL	110	J	138	JF	*1.255
08A-0028-C2CS	621	J	796	JF	*1.282	674	J	963	JF	*1.429	15.9	J	15.9	J	ND or <QL	4.49	J	4.49	J	ND or <QL	162	J	202	JF	*1.247
08A-0028-C2DS	460	J	590	JF	*1.283	484	J	692	JF	*1.430	12.1	J	12.1	J	ND or <QL	4.24	J	4.24	J	ND or <QL	127	J	159	JF	*1.252
08A-0028-C2ES	1060	J	1360	JF	*1.283	827	J	1180	JF	*1.427	24.8	J	24.8	J	ND or <QL	8.67	J	8.67	J	ND or <QL	197	J	246	JF	*1.249
08A-0028-C2FS	1800	J	2310	JF	*1.283	3120	J	4460	JF	*1.429	91.8	J	141	JF	*1.536	16.3	J	16.3	J	ND or <QL	962	J	1200	JF	*1.247
08A-0028-C2GS	34.9		44.7	F	*1.281	27.6		39.4	F	*1.428	< 2.89	UJ	< 2.89	UJ	ND or <QL	0.854	J	0.854	J	ND or <QL	14.4	J	14.4	J	ND or <QL
08A-0028-D1AS	265		340	F	*1.283	206		294	F	*1.427	5.78	J	5.78	J	ND or <QL	2.79	J	2.79	J	ND or <QL	51.7		64.6	F	*1.250
08A-0028-D1BS	533	J	683	JF	*1.281	585	J	836	JF	*1.429	16	J	16	J	ND or <QL	5.96	J	5.96	J	ND or <QL	156	J	195	JF	*1.250
08A-0028-D1CS	565	J	724	JF	*1.281	743	J	1060	JF	*1.427	16.1	J	16.1	J	ND or <QL	6.42	J	6.42	J	ND or <QL	163	J	204	JF	*1.252
08A-0028-D1DS	331	J	424	JF	*1.281	288	J	412	JF	*1.431	7.57	J	7.57	J	ND or <QL	3.57	J	3.57	J	ND or <QL	77.8	J	97.3	JF	*1.251
08A-0028-D1DT	718	J	920	JF	*1.281	547	J	782	JF	*1.430	15	J	15	J	ND or <QL	6.97	J	6.97	J	ND or <QL	130	J	163	JF	*1.254
08A-0028-D1ES	294	J	377	JF	*1.282	544	J	777	JF	*1.428	10.6	J	10.6	J	ND or <QL	3.26	J	3.26	J	ND or <QL	119	J	149	JF	*1.252
08A-0029-C1AS	299	J	383	JF	*1.281	213	J	304	JF	*1.427	7.64	J	7.64	J	ND or <QL	3.06	J	3.06	J	ND or <QL	59	J	73.8	JF	*1.251
08A-0029-C1AT	998	J	1280	JF	*1.283	629	J	899	JF	*1.429	21	J	21	J	ND or <QL	7.45	J	7.45	J	ND or <QL	166	J	208	JF	*1.253
08A-0029-C1BS	1110	J	1420	JF	*1.279	1040	J	1490	JF	*1.433	30.8	J	47.4	JF	*1.539	9.95	J	9.95	J	ND or <QL	237	J	296	JF	*1.249
08A-0029-C1CS	735	J	942	JF	*1.282	865	J	1240	JF	*1.434	23.2	J	23.2	J	ND or <QL	6.37	J	6.37	J	ND or <QL	194	J	242	JF	*1.247
08A-0029-C1CT	1540	J	1970	JF	*1.279	1910	J	2730	JF	*1.429	51.2	J	78.7	JF	*1.537	15.9	J	15.9	J	ND or <QL	414	J	517	JF	*1.249
08A-0029-C1DS	786	J	1010	JF	*1.285	1130	J	1610	JF	*1.425	24.6	J	37.8	JF	*1.537	7.29	J	7.29	J	ND or <QL	233	J	291	JF	*1.249
08A-0029-C1ES	811		1040	F	*1.282	1530		2190	F	*1.431	38.1		58.6	F	*1.538	9.66	J	9.66	J	ND or <QL	413		516	F	*1.249
08A-0029-C1FS	1010		1290	F	*1.277	1620		2310	F	*1.426	38.6		59.4	F	*1.539	9.4	J	9.4	J	ND or <QL	234		292	F	*1.248
08A-0029-C1GS	59.3		76	F	*1.282	20.9	J	20.9	J	ND or <QL	2.73	J	2.73	J	ND or <QL	1.71	J	1.71	J	ND or <QL	13.2	J	13.2	J	ND or <QL
08A-0030-C1AS	424	J	544	JF	*1.283	438	J	626	JF	*1.429	12.8	J	12.8	J	ND or <QL	6.28	J	6.28	J	ND or <QL	121	J	151	JF	*1.248
08A-0030-C1BS	901	J	1160	JF	*1.287	690	J	986	JF	*1.429	23.1	J	23.1	J	ND or <QL	8.84	J	8.84	J	ND or <QL	172	J	215	JF	*1.250
08A-0030-C1CS	778	J	997	JF	*1.281	1620	J	2310	JF	*1.426	43.1	J	43.1	J	ND or <QL	7.37	J	7.37	J	ND or <QL	478	J	597	JF	*1.249
08A-0030-C1DS	1280	J	1640	JF	*1.281	1620	J	2310	JF	*1.426	45.4	J	69.8	JF	*1.537	10.9	J	10.9	J	ND or <QL	388	J	485	JF	*1.250

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,4,6,7,8-HpCDD 35822-46-9 ng/kg					1,2,3,4,6,7,8-HpCDF 67562-39-4 ng/kg					1,2,3,4,7,8,9-HpCDF 55673-89-7 ng/kg					1,2,3,4,7,8-HxCDD 39227-28-6 ng/kg					1,2,3,4,7,8-HxCDF 70648-26-9 ng/kg				
	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0030-C1ES	334	J	428	JF	*1.281	694	J	992	JF	*1.429	16.8	J	16.8	J	ND or <QL	3.61	J	3.61	J	ND or <QL	164	J	205	JF	*1.250
08A-0030-C1FS	221		283	F	*1.281	199		284	F	*1.427	3.97	J	3.97	J	ND or <QL	0.6	J	0.6	J	ND or <QL	25.9		32.4	F	*1.251
08A-0030-C1GS	< 1.36	U	< 1.36	U	ND or <QL	< 0.935	U	< 0.935	U	ND or <QL	< 0.153	UJ	< 0.153	UJ	ND or <QL	< 0.118	U	< 0.118	U	ND or <QL	< 0.178	U	< 0.178	U	ND or <QL
08A-0031-C1AS	801	J	1030	JF	*1.286	310	J	443	JF	*1.429	< 10.6	UJ	< 10.6	UJ	ND or <QL	6.06	J	6.06	J	ND or <QL	78.8	J	78.8	J	ND or <QL
08A-0031-C1BS	883	J	1130	JF	*1.280	812	J	1160	JF	*1.429	22.6	J	22.6	J	ND or <QL	8.27	J	8.27	J	ND or <QL	205	J	256	JF	*1.249
08A-0031-C1CS	286	J	367	JF	*1.283	236	J	337	JF	*1.428	< 9.16	UJ	< 9.16	UJ	ND or <QL	2.66	J	2.66	J	ND or <QL	63.1	J	78.9	JF	*1.250
08A-0031-C1DS	1930	J	2470	JF	*1.280	2320	J	3320	JF	*1.431	68.7	J	106	JF	*1.543	18.9	J	18.9	J	ND or <QL	546	J	683	JF	*1.251
08A-0031-C1ES	63.8		81.8	F	*1.282	114		163	F	*1.430	13.5	J	13.5	J	ND or <QL	1.47	J	1.47	J	ND or <QL	37.2		46.5	F	*1.250
08A-0031-C1FS	< 1.56	UJ	< 1.56	UJ	ND or <QL	< 0.592	UJ	< 0.592	UJ	ND or <QL	< 0.220	UJ	< 0.220	UJ	ND or <QL	< 0.260	U	< 0.260	U	ND or <QL	< 0.183	U	< 0.183	U	ND or <QL
08A-0032-C2AS	183	J	235	JF	*1.284	179	J	256	JF	*1.430	< 5.10	UJ	< 5.10	UJ	ND or <QL	1.9	J	1.9	J	ND or <QL	47.2	J	59	JF	*1.250
08A-0032-C2BS	312	J	400	JF	*1.282	437	J	624	JF	*1.428	11.5	J	11.5	J	ND or <QL	3.69	J	3.69	J	ND or <QL	99.6	J	125	JF	*1.255
08A-0032-C2CS	637	J	817	JF	*1.283	760	J	1090	JF	*1.434	23.8	J	23.8	J	ND or <QL	8.78	J	8.78	J	ND or <QL	198	J	248	JF	*1.253
08A-0032-C2DS	1520	J	1950	JF	*1.283	1250	J	1790	JF	*1.432	44.4	J	68.3	JF	*1.538	11.8	J	11.8	J	ND or <QL	348	J	435	JF	*1.250
08A-0032-C2ES	2020	J	2590	JF	*1.282	9300	J	13300	JF	*1.430	308	J	474	JF	*1.539	31	J	31	J	ND or <QL	3290	J	4110	JF	*1.249
08A-0032-C2FS	141	J	181	JF	*1.284	191	J	273	JF	*1.429	5.98	J	5.98	J	ND or <QL	1.76	J	1.76	J	ND or <QL	47.6	J	59.5	JF	*1.250
08A-0032-C2GS	195		250	F	*1.282	441		630	F	*1.429	11.5	J	11.5	J	ND or <QL	2.96	J	2.96	J	ND or <QL	114		143	F	*1.254
08A-0032-C2HS	80.6		103	F	*1.278	106		151	F	*1.425	6.68	J	6.68	J	ND or <QL	0.895	J	0.895	J	ND or <QL	17.5	J	17.5	J	ND or <QL
08A-0032-C2IS	16.6		21.3	F	*1.283	19.6		28	F	*1.429	2.29	J	2.29	J	ND or <QL	0.275	J	0.275	J	ND or <QL	4.73	J	4.73	J	ND or <QL
08A-0033-C1AS	372	J	477	JF	*1.282	349	J	499	JF	*1.430	11	J	11	J	ND or <QL	4.03	J	4.03	J	ND or <QL	96.4	J	121	JF	*1.255
08A-0033-C1BS	599	J	768	JF	*1.282	519	J	742	JF	*1.430	14.6	J	14.6	J	ND or <QL	5.74	J	5.74	J	ND or <QL	134	J	168	JF	*1.254
08A-0033-C1CS	376	J	482	JF	*1.282	382	J	546	JF	*1.429	9.45	J	9.45	J	ND or <QL	4.09	J	4.09	J	ND or <QL	103	J	129	JF	*1.252
08A-0033-C1DS	926	J	1190	JF	*1.285	1460	J	2090	JF	*1.432	39	J	39	J	ND or <QL	10.5	J	10.5	J	ND or <QL	414	J	517	JF	*1.249
08A-0033-C1ES	267	J	342	JF	*1.281	319	J	456	JF	*1.429	9.75	J	9.75	J	ND or <QL	3.21	J	3.21	J	ND or <QL	81.8	J	102	JF	*1.247
08A-0033-C1ET	46.9	J	60.1	JF	*1.281	52.4	J	74.9	JF	*1.429	< 1.81	UJ	< 1.81	UJ	ND or <QL	0.614	J	0.614	J	ND or <QL	19.5	J	19.5	J	ND or <QL
08A-0034-C1AS	140		179	F	*1.279	108		154	F	*1.426	4.46	J	4.46	J	ND or <QL	1.6	J	1.6	J	ND or <QL	34.5		43.1	F	*1.249
08A-0034-C1BS	320		410	F	*1.281	279	J	399	JF	*1.430	8.13	J	8.13	J	ND or <QL	3.18	J	3.18	J	ND or <QL	79.5		99.4	F	*1.250
08A-0034-C1CS	577		740	F	*1.282	392		560	F	*1.429	14.4	J	14.4	J	ND or <QL	4.71	J	4.71	J	ND or <QL	102		127	F	*1.245
08A-0034-D2AS	188		241	F	*1.282	146		209	F	*1.432	3.97	J	3.97	J	ND or <QL	2.28	J	2.28	J	ND or <QL	32		40	F	*1.250
08A-0034-D2BS	91.2		117	F	*1.283	67.1		95.9	F	*1.429	1.86	J	1.86	J	ND or <QL	1.25	J	1.25	J	ND or <QL	16.7	J	16.7	J	ND or <QL
08A-0034-D2CS	263		337	F	*1.281	195		279	F	*1.431	5.32	J	5.32	J	ND or <QL	2.69	J	2.69	J	ND or <QL	49.7		62.1	F	*1.249
08A-0034-D2DS	263		337	F	*1.281	245		350	F	*1.429	6.54	J	6.54	J	ND or <QL	2.51	J	2.51	J	ND or <QL	66.2		82.8	F	*1.251
08A-0034-D2ES	234		300	F	*1.282	162		231	F	*1.426	4.63	J	4.63	J	ND or <QL	2.11	J	2.11	J	ND or <QL	46.4		58	F	*1.250
08A-0035-C5AS	9.63	J	9.63	J	ND or <QL	7.78	J	7.78	J	ND or <QL	1.08	J	1.08	J	ND or <QL	0.377	J	0.377	J	ND or <QL	5.1	J	5.1	J	ND or <QL
08A-0036-C2AS	124		159	F	*1.282	95.7		137	F	*1.432	2.97	J	2.97	J	ND or <QL	1.54	J	1.54	J	ND or <QL	23.3		29.1	F	*1.249
08A-0036-C2BS	79.6		102	F	*1.281	39.6		56.6	F	*1.429	< 1.26	UJ	< 1.26	UJ	ND or <QL	0.485	J	0.485	J	ND or <QL	11	J	11	J	ND or <QL
08A-0036-C2CS	685		878	F	*1.282	503		719	F	*1.429	16.8	J	16.8	J	ND or <QL	5.51	J	5.51	J	ND or <QL	130	J	163	JF	*1.254
08A-0036-C2DS	624		800	F	*1.282	698		997	F	*1.428	22.1	J	34	JF	*1.538	5.59	J	5.59	J	ND or <QL	163	J	204	JF	*1.252
08A-0036-C2ES	991		1270	F	*1.282	1040	J	1490	JF	*1.433	33.8	J	52	JF	*1.538	10.4	J	10.4	J	ND or <QL	286	J	358	JF	*1.252
08A-0036-C2ET	992		1270	F	*1.280	734	J	1050	JF	*1.431	25.3	J	38.9	JF	*1.538	8.78	J	8.78	J	ND or <QL	210	J	263	JF	*1.252
08A-0036-C2FS	580		744	F	*1.283	970		1390	F	*1.433	29.2	J	44.9	JF	*1.538	7.37	J	7.37	J	ND or <QL	331		414	F	*1.251
08A-0036-C2GS	298		382	F	*1.282	1390		1990	F	*1.432	45	J	69.2	JF	*1.538	4.46	J	4.46	J	ND or <QL	482		603	F	*1.251
08A-0037-C1AS	292		374	F	*1.281	157		224	F	*1.427	5.67	J	5.67	J	ND or <QL	3.18	J	3.18	J	ND or <QL	39.6		49.5	F	*1.250
08A-0037-C1BS	162	J	208	JF	*1.284	171	J	244	JF	*1.427	5.46	J	5.46	J	ND or <QL	2.03	J	2.03	J	ND or <QL	55.2	J	69	JF	*1.250
08A-0037-C1CS	468		600	F	*1.282	215		307	F	*1.428	8.19	J	8.19	J	ND or <QL	2.69	J	2.69	J	ND or <QL	55.5		69.4	F	*1.250
08A-0037-C1DS	230		295	F	*1.283	141		201	F	*1.426	5.31	J	5.31	J	ND or <QL	1.91	J	1.91	J	ND or <QL	37.5		46.9	F	*1.251
08A-0037-C1ES	273		350	F	*1.282	229		327	F	*1.428	7.92	J	7.92	J	ND or <QL	2.43	J	2.43	J	ND or <QL	56.4		70.5	F	*1.250
08A-0038-C1AS	224		287	F	*1.281	209		299	F	*1.431	7.65	J	7.65	J	ND or <QL	2.75	J	2.75	J	ND or <QL	50.8		63.5	F	*1.250
08A-0038-C1BS	446		572	F	*1.283	273		390	F	*1.429	10.4	J	10.4	J	ND or <QL	4.49	J	4.49	J	ND or <QL	68.6		85.8	F	*1.251
08A-0038-C1CS	601		770	F	*1.281	378		540	F	*1.429	14.9	J	14.9	J	ND or <QL	5.39	J	5.39	J	ND or <QL	90.3		113	F	*1.251
08A-0038-C1DS	525	J	673	JF	*1.282	281	J	402	JF	*1.431	11.4	J	11.4	J	ND or <QL	9.89	J	9.89	J	ND or <QL	73	J	91.3	JF	*1.251
08A-0038-C1ES	1190		939	B	Split-Replaced	895		729	B	Split-Replaced	47.3		36.1	B	Split-Replaced	9.31	J	14.7	B	Split-Replaced	240		165	B	Split-Replaced
08A-0038-C2FS	591		758	F	*1.283	587		839	F	*1.429	20.4	J	20.4	J	ND or <QL	5.85	J	5.85	J	ND or <QL	167		209	F	*1.251
08A-0038-C2GS	114		146	F	*1.281	198		283	F	*1.429	6.26	J	6.26	J	ND or <QL	1.75	J	1.75	J	ND or <QL	29		36.3	F	*1.252

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,4,6,7,8-HpCDD 35822-46-9 ng/kg					1,2,3,4,6,7,8-HpCDF 67562-39-4 ng/kg					1,2,3,4,7,8,9-HpCDF 55673-89-7 ng/kg					1,2,3,4,7,8-HxCDD 39227-28-6 ng/kg					1,2,3,4,7,8-HxCDF 70648-26-9 ng/kg				
	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0039-C1AS	297		381	F	*1.283	215		307	F	*1.428	6.91	J	6.91	J	ND or <QL	3.34	J	3.34	J	ND or <QL	53.1		66.4	F	*1.250
08A-0039-C1BS	331	J	424	JF	*1.281	241	J	344	JF	*1.427	7.36	J	7.36	J	ND or <QL	3.65	J	3.65	J	ND or <QL	69.9	J	87.4	JF	*1.250
08A-0039-C1CS	358		459	F	*1.282	296		423	F	*1.429	9.68	J	9.68	J	ND or <QL	3.72	J	3.72	J	ND or <QL	66.7		83.4	F	*1.250
08A-0039-C1DS	689		883	F	*1.282	398		569	F	*1.430	13.1	J	13.1	J	ND or <QL	5.78	J	5.78	J	ND or <QL	93.6		117	F	*1.250
08A-0039-C1ES	399		512	F	*1.283	271		387	F	*1.428	10.3	J	10.3	J	ND or <QL	5.18	J	5.18	J	ND or <QL	70.5		88.1	F	*1.250
08A-0039-C1FS	1040	J	1330	JF	*1.279	1770	J	2530	JF	*1.429	30.7	J	47.2	JF	*1.537	11.5	J	11.5	J	ND or <QL	172	J	215	JF	*1.250
08A-0039-C1GS	734		941	F	*1.282	652		932	F	*1.429	20.7	J	20.7	J	ND or <QL	6.67	J	6.67	J	ND or <QL	83.7		105	F	*1.254
08A-0039-C1HS	1020	J	1310	JF	*1.284	846	J	1210	JF	*1.430	26.5	J	40.8	JF	*1.540	9.9	J	9.9	J	ND or <QL	108	J	135	JF	*1.250
08A-0040-C1AS	351		450	F	*1.282	403		576	F	*1.429	14	J	14	J	ND or <QL	3.99	J	3.99	J	ND or <QL	134		168	F	*1.254
08A-0040-C1BS	1060		1360	F	*1.283	1170		1670	F	*1.427	42.2		64.9	F	*1.538	10.4	J	10.4	J	ND or <QL	355		444	F	*1.251
08A-0040-C1CS	940		1210	F	*1.287	1340		1910	F	*1.425	40.5		62.3	F	*1.538	9.37	J	9.37	J	ND or <QL	279		349	F	*1.251
08A-0040-C1CT	941		1210	F	*1.286	1360		1940	F	*1.426	42.1		64.7	F	*1.537	8	J	8	J	ND or <QL	293		366	F	*1.249
08A-0040-C1DS	662		849	F	*1.282	722		1030	F	*1.427	23.6	J	23.6	J	ND or <QL	7.68	J	7.68	J	ND or <QL	153		191	F	*1.248
08A-0040-C1ES	359	J	460	JF	*1.281	346	J	494	JF	*1.428	12.5	J	12.5	J	ND or <QL	4.01	J	4.01	J	ND or <QL	60.1		75.1	F	*1.250
08A-0040-C1ET	267	J	342	JF	*1.281	251	J	359	JF	*1.430	8.59	J	8.59	J	ND or <QL	3.11	J	3.11	J	ND or <QL	41.3		51.6	F	*1.249
08A-0041-C1AS	693	J	888	JF	*1.281	372	J	532	JF	*1.430	17.1	J	17.1	J	ND or <QL	9.71	J	9.71	J	ND or <QL	88.3	J	110	JF	*1.246
08A-0041-C1BS	3090		3960	F	*1.282	555		793	F	*1.429	15.8	J	15.8	J	ND or <QL	23.1		23.1		None	55.9	J	69.9	JF	*1.250
08A-0041-C1CS	140		179	F	*1.279	109		156	F	*1.431	4.13	J	4.13	J	ND or <QL	2.13	J	2.13	J	ND or <QL	24.2		30.3	F	*1.252
08A-0041-C1DS	948	J	1220	JF	*1.287	1260	J	1800	JF	*1.429	36.3	J	36.3	J	ND or <QL	10.5	J	10.5	J	ND or <QL	258	J	323	JF	*1.252
08A-0041-C1DT	385	J	494	JF	*1.283	517	J	739	JF	*1.429	16.9	J	16.9	J	ND or <QL	5.6	J	5.6	J	ND or <QL	111	J	139	JF	*1.252
08A-0041-C1ES	33.2		42.6	F	*1.283	47.4		67.7	F	*1.428	1.77	J	1.77	J	ND or <QL	0.768	J	0.768	J	ND or <QL	10.8	J	10.8	J	ND or <QL
08A-0042-C2AS	632	J	810	JF	*1.282	664	J	949	JF	*1.429	21.8	J	21.8	J	ND or <QL	9.63	J	9.63	J	ND or <QL	154	J	193	JF	*1.253
08A-0042-C2BS	53.3	J	68.3	JF	*1.281	34.6	J	49.4	JF	*1.428	2.7	J	2.7	J	ND or <QL	1.95	J	1.95	J	ND or <QL	8.33	J	8.33	J	ND or <QL
08A-0042-C2CS	915	J	1170	JF	*1.279	859	J	1230	JF	*1.432	26.6	J	40.9	JF	*1.538	9.52	J	9.52	J	ND or <QL	205	J	256	JF	*1.249
08A-0042-C2DS	460		590	F	*1.283	320		457	F	*1.428	13.3	J	13.3	J	ND or <QL	4.74	J	4.74	J	ND or <QL	80		100	F	*1.250
08A-0042-C2ES	1480	J	1900	JF	*1.284	2970	J	4240	JF	*1.428	73.3	J	113	JF	*1.542	17.8	J	17.8	J	ND or <QL	656	J	820	JF	*1.250
08A-0043-C2AS	423	J	542	JF	*1.281	467	J	667	JF	*1.428	13.5	J	13.5	J	ND or <QL	5.43	J	5.43	J	ND or <QL	105	J	131	JF	*1.248
08A-0043-C2BS	94		748	B	Split-Replaced	62.4		504	B	Split-Replaced	2.74	J	26.8	B	Split-Replaced	0.828	J	8.59	BJ	Split-Replaced	15	J	113	B	Split-Replaced
08A-0043-C2CS	2250	J	2220	B	Split-Replaced	1210	J	1230	B	Split-Replaced	46.2	J	59.8	B	Split-Replaced	14.9	J	18.4	B	Split-Replaced	291	J	283	B	Split-Replaced
08A-0043-C2DS	705	J	904	JF	*1.282	357	J	510	JF	*1.429	12.5	J	12.5	J	ND or <QL	4.2	J	4.2	J	ND or <QL	91.1	J	114	JF	*1.251
08A-0044-C1AS	302	J	387	JF	*1.281	503	J	719	JF	*1.429	13.6	J	13.6	J	ND or <QL	3.34	J	3.34	J	ND or <QL	109	J	136	JF	*1.248
08A-0044-C1BS	488		626	F	*1.283	376		537	F	*1.428	12.7	J	12.7	J	ND or <QL	5.4	J	5.4	J	ND or <QL	86.8		109	F	*1.256
08A-0044-C1CS	94.7		121	F	*1.278	59.8		85.5	F	*1.430	2.45	J	2.45	J	ND or <QL	1.15	J	1.15	J	ND or <QL	15.6	J	15.6	J	ND or <QL
08A-0044-C1DS	19.7		25.3	F	*1.284	3.2	J	3.2	J	ND or <QL	< 0.120	U	< 0.120	U	ND or <QL	< 0.105	U	< 0.105	U	ND or <QL	0.861	J	0.861	J	ND or <QL
08A-0044-C1ES	10.8	J	10.8	J	ND or <QL	1.84	J	1.84	J	ND or <QL	< 0.138	U	< 0.138	U	ND or <QL	< 0.0935	U	< 0.0935	U	ND or <QL	0.533	J	0.533	J	ND or <QL
08A-0045-C2AS	967	J	1240	JF	*1.282	1660	J	2370	JF	*1.428	44.2	J	68	JF	*1.538	8.4	J	8.4	J	ND or <QL	471	J	589	JF	*1.251
08A-0045-C2BS	2520	J	3230	JF	*1.282	6850	J	9790	JF	*1.429	186	J	286	JF	*1.538	28	J	28	J	ND or <QL	1930	J	2410	JF	*1.249
08A-0045-C2CS	785	J	1010	JF	*1.287	1740	J	2490	JF	*1.431	36.7	J	56.4	JF	*1.537	9.86	J	9.86	J	ND or <QL	400	J	500	JF	*1.250
08A-0045-C2DS	894		1150	F	*1.286	1240		1770	F	*1.427	30.8		47.4	F	*1.539	10.2	J	10.2	J	ND or <QL	179		224	F	*1.251
08A-0045-C2ES	675	J	865	JF	*1.281	1160	J	1660	JF	*1.431	34.9	J	53.7	JF	*1.539	6.74	J	6.74	J	ND or <QL	126		158	F	*1.254
08A-0045-C2FS	114		146	F	*1.281	245		350	F	*1.429	35		53.8	F	*1.537	1.78	J	1.78	J	ND or <QL	56.1		70.1	F	*1.250
08A-0045-C2FT	125		160	F	*1.280	254		363	F	*1.429	36.4		56	F	*1.538	2.2	J	2.2	J	ND or <QL	60.9		76.1	F	*1.250
08A-0045-C2GS	31.7		40.6	F	*1.281	132		189	F	*1.432	11.3	J	11.3	J	ND or <QL	0.837	J	0.837	J	ND or <QL	34.7		43.4	F	*1.251
08A-0045-C2HS	65.1		83.5	F	*1.283	49		70	F	*1.429	4.98	J	4.98	J	ND or <QL	2.2	J	2.2	J	ND or <QL	20.7		25.9	F	*1.251
08A-0045-C2IS	45.1		57.8	F	*1.282	40.4		57.7	F	*1.428	3.91	J	3.91	J	ND or <QL	1.27	J	1.27	J	ND or <QL	16.3	J	16.3	J	ND or <QL
08A-0046-C2AS	22.2	J	22.2	J	ND or <QL	27		38.6	F	*1.430	1.29	J	1.29	J	ND or <QL	0.339	J	0.339	J	ND or <QL	6.81	J	6.81	J	ND or <QL
08A-0047-C1AS	303	J	388	JF	*1.281	264	J	377	JF	*1.428	8.02	J	8.02	J	ND or <QL	3.63	J	3.63	J	ND or <QL	65.2	J	81.5	JF	*1.250
08A-0047-C1BS	49.7		63.7	F	*1.282	70.5		101	F	*1.433	2.06	J	2.06	J	ND or <QL	0.636	J	0.636	J	ND or <QL	16.6		20.8	F	*1.253
08A-0047-C1CS	23.7		30.4	F	*1.283	28		40	F	*1.429	1.09	J	1.09	J	ND or <QL	0.321	J	0.321	J	ND or <QL	6.35		7.94	F	*1.250
08A-0047-C1DS	84.8		109	F	*1.285	28.3		40.4	F	*1.428	3.08	J	3.08	J	ND or <QL	2.07	J	2.07	J	ND or <QL	13.4	J	16.8	JF	*1.254
08A-0047-C1ES	8.05		10.3	F	*1.280	4.61	J	4.61	J	ND or <QL	0.267	J	0.267	J	ND or <QL	1	J	1	J	ND or <QL	1.53	J	1.53	J	ND or <QL
08A-0047-D4AS	162		208	F	*1.284	124		177	F	*1.427	3.16	J	3.16	J	ND or <QL	1.91	J	1.91	J	ND or <QL	27.5		34.4	F	*1.251
08A-0047-D4BS	125		160	F	*1.280	99.1		142	F	*1.433	2.83	J	2.83	J	ND or <QL	1.66	J	1.66	J	ND or <QL	25.2	J	25.2	J	ND or <QL

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,4,6,7,8-HpCDD 35822-46-9 ng/kg					1,2,3,4,6,7,8-HpCDF 67562-39-4 ng/kg					1,2,3,4,7,8,9-HpCDF 55673-89-7 ng/kg					1,2,3,4,7,8-HxCDD 39227-28-6 ng/kg					1,2,3,4,7,8-HxCDF 70648-26-9 ng/kg				
	Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted		
	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]
08A-0047-D4CS	174		223	F	*1.282	65.5		93.6	F	*1.429	3.18	J	3.18	J	ND or <QL	2.31	J	2.31	J	ND or <QL	15.8	J	15.8	J	ND or <QL
08A-0047-D4DS	38.4		49.2	F	*1.281	39.2		56	F	*1.429	1.26	J	1.26	J	ND or <QL	0.615	J	0.615	J	ND or <QL	10.8	J	10.8	J	ND or <QL
08A-0047-D4ES	114		146	F	*1.281	68.6		98	F	*1.429	2.4	J	2.4	J	ND or <QL	1.08	J	1.08	J	ND or <QL	16.6	J	16.6	J	ND or <QL
08A-0048-C2AS	49	J	62.8	JF	*1.282	62.6	J	89.5	JF	*1.430	2.13	J	2.13	J	ND or <QL	0.497	J	0.497	J	ND or <QL	17.4	J	21.8	JF	*1.253
08A-0048-C2BS	55		70.5	F	*1.282	9.69		13.8	F	*1.424	1.13	J	1.13	J	ND or <QL	1.2	J	1.2	J	ND or <QL	4.86	J	4.86	J	ND or <QL
08A-0048-C2CS	28.2	J	36.2	JF	*1.284	6.34	J	6.34	J	ND or <QL	0.691	J	0.691	J	ND or <QL	< 0.154	UJ	< 0.154	UJ	ND or <QL	3.48	J	3.48	J	ND or <QL
08A-0048-C2DS	< 0.240	U	< 0.240	U	ND or <QL	< 0.187	U	< 0.187	U	ND or <QL	< 0.212	U	< 0.212	U	ND or <QL	< 0.152	U	< 0.152	U	ND or <QL	< 0.104	U	< 0.104	U	ND or <QL
08A-0048-C2ES	5.67	J	5.67	J	ND or <QL	< 0.149	U	< 0.149	U	ND or <QL	< 0.159	U	< 0.159	U	ND or <QL	< 0.104	U	< 0.104	U	ND or <QL	< 0.140	U	< 0.140	U	ND or <QL
08A-0049-C1AS	25		32.1	F	*1.284	20.5	J	20.5	J	ND or <QL	0.832	J	0.832	J	ND or <QL	0.377	J	0.377	J	ND or <QL	5.4	J	5.4	J	ND or <QL
08A-0049-C1BS	62.7		80.4	F	*1.282	91.6		131	F	*1.430	2.61	J	2.61	J	ND or <QL	0.699	J	0.699	J	ND or <QL	21.6		27	F	*1.250
08A-0049-C1CS	47.2		60.5	F	*1.282	98.6		141	F	*1.430	2.85	J	2.85	J	ND or <QL	0.72	J	0.72	J	ND or <QL	24.7		30.9	F	*1.251
08A-0049-C1DS	144	J	185	JF	*1.285	73.9	J	106	JF	*1.434	3.07	J	3.07	J	ND or <QL	0.986	J	0.986	J	ND or <QL	12.3	J	12.3	J	ND or <QL
08A-0049-C2ES	68.2		87.4	F	*1.282	43.2		61.7	F	*1.428	2.01	J	2.01	J	ND or <QL	0.662	J	0.662	J	ND or <QL	9.01	J	9.01	J	ND or <QL
08A-0050-C1AS	104	J	133	JF	*1.279	65.8	J	94	JF	*1.429	2.46	J	2.46	J	ND or <QL	1.23	J	1.23	J	ND or <QL	18.9	J	18.9	J	ND or <QL
08A-0050-C1BS	213		286	B	Split-Replaced	118		226	B	Split-Replaced	4.46	J	11.3	B	Split-Replaced	1.45	J	5.35	BJ	Split-Replaced	25.8	J	52.4	B	Split-Replaced
08A-0050-C1CS	243		328	B	Split-Replaced	235		258	B	Split-Replaced	5.68	J	10.8	B	Split-Replaced	2.89	J	4.91	EZ	Split-Replaced	33.8		42.2	B	Split-Replaced
08A-0050-C1DS	< 2.43	U	< 2.43	U	ND or <QL	< 0.474	U	< 0.474	U	ND or <QL	< 0.269	UJ	< 0.269	UJ	ND or <QL	< 0.267	U	< 0.267	U	ND or <QL	< 0.116	U	< 0.116	U	ND or <QL
08A-0051-C1AS	62.5		80.1	F	*1.282	59		84.3	F	*1.429	1.98	J	1.98	J	ND or <QL	0.725	J	0.725	J	ND or <QL	12.9	J	12.9	J	ND or <QL
08A-0051-C1BS	91.7		11	B	Split-Replaced	13.2	J	7.78	E	Split-Replaced	0.795	J	< 0.382	U	Split-Replaced	< 0.0891	U	< 0.278	U	Split-Replaced	1.5	J	2.66	BJ	Split-Replaced
08A-0051-C2CS	18.9		29.9	B	Split-Replaced	14.1	J	37.4	B	Split-Replaced	0.574	J	< 1.29	U	Split-Replaced	0.352	J	< 0.392	U	Split-Replaced	3.66	J	7.65	BJ	Split-Replaced
08A-0052-C2AS	47.8		61.3	F	*1.282	37		52.9	F	*1.430	1.23	J	1.23	J	ND or <QL	0.538	J	0.538	J	ND or <QL	9.19	J	9.19	J	ND or <QL
08A-0054-C3AS	< 3.89	U	< 3.89	U	ND or <QL	< 2.28	U	< 2.28	U	ND or <QL	0.0782	J	0.0782	J	ND or <QL	0.0729	J	0.0729	J	ND or <QL	< 0.616	U	< 0.616	U	ND or <QL
08A-0054-C3BS	< 1.43	U	< 1.43	U	ND or <QL	< 0.386	U	< 0.386	U	ND or <QL	< 0.0583	U	< 0.0583	U	ND or <QL	0.042	J	0.042	J	ND or <QL	< 0.0352	U	< 0.0352	U	ND or <QL
08A-0054-C3CS	< 2.15	U	< 2.15	U	ND or <QL	< 0.515	U	< 0.515	U	ND or <QL	0.0495	J	0.0495	J	ND or <QL	< 0.0144	U	< 0.0144	U	ND or <QL	< 0.0881	UJ	< 0.0881	UJ	ND or <QL
08A-0055-C2AS	523	J	670	JF	*1.281	445	J	636	JF	*1.429	14.4	J	14.4	J	ND or <QL	6.41	J	6.41	J	ND or <QL	109	J	136	JF	*1.248
08A-0055-C2BS	392		503	F	*1.283	274		392	F	*1.431	7.34	J	7.34	J	ND or <QL	2.29	J	2.29	J	ND or <QL	42.1		52.6	F	*1.249
08A-0055-C2CS	5.66	J	5.66	J	ND or <QL	< 0.254	U	< 0.254	U	ND or <QL	< 0.235	U	< 0.235	U	ND or <QL	< 0.204	U	< 0.204	U	ND or <QL	< 0.165	U	< 0.165	U	ND or <QL
08A-0055-C2DS	< 1.32	U	< 1.32	U	ND or <QL	< 0.145	U	< 0.145	U	ND or <QL	< 0.150	U	< 0.150	U	ND or <QL	< 0.191	U	< 0.191	U	ND or <QL	< 0.135	U	< 0.135	U	ND or <QL
08A-0055-C2ES	< 1.85	U	< 1.85	U	ND or <QL	< 0.170	U	< 0.170	U	ND or <QL	< 0.167	U	< 0.167	U	ND or <QL	< 0.188	U	< 0.188	U	ND or <QL	< 0.146	U	< 0.146	U	ND or <QL
08A-0055-C2FS	< 1.94	U	< 1.94	U	ND or <QL	0.55	J	0.55	J	ND or <QL	< 0.241	U	< 0.241	U	ND or <QL	< 0.305	U	< 0.305	U	ND or <QL	< 0.201	U	< 0.201	U	ND or <QL
08A-0056-C2AS	323	J	414	JF	*1.282	174	J	249	JF	*1.431	6.02	J	6.02	J	ND or <QL	4.5	J	4.5	J	ND or <QL	42.7	J	53.4	JF	*1.251
08A-0056-C2BS	94.3		121	F	*1.283	52.8		75.5	F	*1.430	2.01	J	2.01	J	ND or <QL	0.875	J	0.875	J	ND or <QL	13.5	J	13.5	J	ND or <QL
08A-0056-C2CS	149		191	F	*1.282	101		144	F	*1.426	3.6	J	3.6	J	ND or <QL	1.22	J	1.22	J	ND or <QL	23.5		29.4	F	*1.251
08A-0056-C2DS	687		881	F	*1.282	484		692	F	*1.430	17.7		27.2	F	*1.537	5.79	J	5.79	J	ND or <QL	125	J	156	JF	*1.248
08A-0056-C2ES	1310	J	1680	JF	*1.282	1080	J	1540	JF	*1.426	36.3	J	55.8	JF	*1.537	12.3	J	12.3	J	ND or <QL	325	J	406	JF	*1.249
08A-0056-C2FS	2640	J	3380	JF	*1.280	3040	J	4340	JF	*1.428	81.7	J	126	JF	*1.542	24.1	J	24.1	J	ND or <QL	767	J	959	JF	*1.250
08A-0056-C2GS	2200	J	2820	JF	*1.282	3030	J	4330	JF	*1.429	86.2	J													

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,4,6,7,8-HpCDD 35822-46-9 ng/kg					1,2,3,4,6,7,8-HpCDF 67562-39-4 ng/kg					1,2,3,4,7,8,9-HpCDF 55673-89-7 ng/kg					1,2,3,4,7,8-HxCDD 39227-28-6 ng/kg					1,2,3,4,7,8-HxCDF 70648-26-9 ng/kg				
	Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted		
	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]
08A-0058-C1FS	< 5.46	U	< 5.46	U	ND or <QL	< 2.17	U	< 2.17	U	ND or <QL	< 0.227	U	< 0.227	U	ND or <QL	< 0.203	U	< 0.203	U	ND or <QL	1.6	J	1.6	J	ND or <QL
08A-0060-C1AS	631	J	809	JF	*1.282	290	J	414	JF	*1.428	11.4	J	11.4	J	ND or <QL	7.68	J	7.68	J	ND or <QL	51.7	J	64.6	JF	*1.250
08A-0060-C1BS	167	J	214	JF	*1.281	152	J	217	JF	*1.428	4.75	J	4.75	J	ND or <QL	2.84	J	2.84	J	ND or <QL	38.4	J	38.4	J	ND or <QL
08A-0060-C1CS	920	J	1180	JF	*1.283	983	J	1400	JF	*1.424	27.8	J	27.8	J	ND or <QL	11.3	J	11.3	J	ND or <QL	227	J	284	JF	*1.251
08A-0060-C1DS	657	J	842	JF	*1.282	963	J	1380	JF	*1.433	24.8	J	24.8	J	ND or <QL	7.63	J	7.63	J	ND or <QL	244	J	305	JF	*1.250
08A-0060-C1ES	139		178	F	*1.281	156		223	F	*1.429	4.94	J	4.94	J	ND or <QL	1.39	J	1.39	J	ND or <QL	34.4		43	F	*1.250
08A-0060-C1FS	< 3.07	U	< 3.07	U	ND or <QL	0.682	J	0.682	J	ND or <QL	< 0.264	U	< 0.264	U	ND or <QL	< 0.241	U	< 0.241	U	ND or <QL	< 0.131	U	< 0.131	U	ND or <QL
08A-0060-C1GS	< 4.80	U	< 4.80	U	ND or <QL	12.8	J	12.8	J	ND or <QL	0.966	J	0.966	J	ND or <QL	< 0.111	U	< 0.111	U	ND or <QL	2.89	J	2.89	J	ND or <QL
08A-0061-C1AS	61.1		78.3	F	*1.282	37.1		53	F	*1.429	2.02	J	2.02	J	ND or <QL	< 0.787	U	< 0.787	U	ND or <QL	10.6	J	10.6	J	ND or <QL
08A-0061-C1BS	12.6	J	12.6	J	ND or <QL	11.8	J	11.8	J	ND or <QL	< 0.51	UJ	< 0.51	UJ	ND or <QL	< 0.204	U	< 0.204	U	ND or <QL	2.86	J	2.86	J	ND or <QL
08A-0061-C1CS	15.6	J	15.6	J	ND or <QL	10.6	J	10.6	J	ND or <QL	0.727	J	0.727	J	ND or <QL	< 0.189	U	< 0.189	U	ND or <QL	2.62	J	2.62	J	ND or <QL
08A-0061-C1DS	14.6	J	14.6	J	ND or <QL	9.3	J	9.3	J	ND or <QL	0.76	J	0.76	J	ND or <QL	0.41	J	0.41	J	ND or <QL	3.44	J	3.44	J	ND or <QL
08A-0061-C1ES	< 0.634	UJ	< 0.634	UJ	ND or <QL	< 0.266	U	< 0.266	U	ND or <QL	< 0.306	UJ	< 0.306	UJ	ND or <QL	< 0.208	U	< 0.208	U	ND or <QL	< 0.122	U	< 0.122	U	ND or <QL
08A-0062-C1AS	209	J	268	JF	*1.282	318	J	454	JF	*1.428	9.11	J	9.11	J	ND or <QL	2.8	J	2.8	J	ND or <QL	44	J	55	JF	*1.250
08A-0062-C1BS	1050	J	1350	JF	*1.286	1430	J	2040	JF	*1.427	38.3	J	58.9	JF	*1.538	9.05	J	9.05	J	ND or <QL	126	J	158	JF	*1.254
08A-0062-C1CS	1430	J	1830	JF	*1.280	3930	J	5620	JF	*1.430	71.2	J	110	JF	*1.545	12.3	J	12.3	J	ND or <QL	265	J	331	JF	*1.249
08A-0062-C1DS	82.1		105	F	*1.279	106		151	F	*1.425	9.15	J	9.15	J	ND or <QL	1.01	J	1.01	J	ND or <QL	14.1	J	14.1	J	ND or <QL
08A-0062-C1ES	86.8		167	B	Split-Replaced	239		394	B	Split-Replaced	33.4		64.8	B	Split-Replaced	1.12	J	4.68	BJ	Split-Replaced	59.1		87.5	B	Split-Replaced
08A-0062-C1FS	58.8		47.1	B	Split-Replaced	130		105	B	Split-Replaced	11	J	12.6	B	Split-Replaced	1.7	J	1.75	EZ	Split-Replaced	35.1		28.5	B	Split-Replaced
08A-0062-C1GS	< 3.17	U	9.06	B	Split-Replaced	2.63	J	5.77	BJ	Split-Replaced	< 0.144	U	< 0.654	U	Split-Replaced	< 0.0924	U	< 0.251	U	Split-Replaced	0.608	J	1.2	BJ	Split-Replaced
08A-0062-C1HS	< 2.68	U	< 2.68	U	ND or <QL	< 1.23	U	< 1.23	U	ND or <QL	< 0.0903	U	< 0.0903	U	ND or <QL	< 0.0524	U	< 0.0524	U	ND or <QL	0.384	J	0.384	J	ND or <QL
08A-0062-D1AS	128	J	164	JF	*1.281	95.9	J	137	JF	*1.429	3.08	J	3.08	J	ND or <QL	1.59	J	1.59	J	ND or <QL	26.2	J	26.2	J	ND or <QL
08A-0062-D1BS	201	J	258	JF	*1.284	146	J	209	JF	*1.432	4.55	J	4.55	J	ND or <QL	2.61	J	2.61	J	ND or <QL	34.6	J	34.6	J	ND or <QL
08A-0062-D1CS	613	J	786	JF	*1.282	460	J	657	JF	*1.428	13.5	J	13.5	J	ND or <QL	6.87	J	6.87	J	ND or <QL	109	J	136	JF	*1.248
08A-0062-D1DS	298	J	382	JF	*1.282	358	J	512	JF	*1.430	7.28	J	7.28	J	ND or <QL	2.18	J	2.18	J	ND or <QL	44	J	55	JF	*1.250
08A-0062-D1ES	1340	J	1720	JF	*1.284	3050	J	4360	JF	*1.430	54.3	J	83.5	JF	*1.538	11	J	11	J	ND or <QL	233	J	291	JF	*1.249
08A-0062-D1ET	1220	J	1560	JF	*1.279	2730	J	3900	JF	*1.429	51.3	J	78.9	JF	*1.538	8.3	J	8.3	J	ND or <QL	234	J	292	JF	*1.248
08A-0063-C1AS	584	J	749	JF	*1.283	544	J	777	JF	*1.428	16.8	J	16.8	J	ND or <QL	7.15	J	7.15	J	ND or <QL	125	J	156	JF	*1.248
08A-0063-C1BS	908	J	1160	JF	*1.278	1470	J	2100	JF	*1.429	35.9	J	35.9	J	ND or <QL	10.5	J	10.5	J	ND					

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,4,6,7,8-HpCDD 35822-46-9 ng/kg					1,2,3,4,6,7,8-HpCDF 67562-39-4 ng/kg					1,2,3,4,7,8,9-HpCDF 55673-89-7 ng/kg					1,2,3,4,7,8-HxCDD 39227-28-6 ng/kg					1,2,3,4,7,8-HxCDF 70648-26-9 ng/kg				
	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0067-C2CS	386		495	F	*1.282	374		534	F	*1.428	12.7	J	12.7	J	ND or <QL	4.37	J	4.37	J	ND or <QL	76.6		95.8	F	*1.251
08A-0067-C2DS	< 2.74	U	< 2.74	U	ND or <QL	< 2.54	U	< 2.54	U	ND or <QL	< 0.147	U	< 0.147	U	ND or <QL	< 0.180	U	< 0.180	U	ND or <QL	0.837	J	0.837	J	ND or <QL
08A-0067-C2ES	< 4.02	U	5.58	BJ	Split-Replaced	< 0.230	U	< 0.238	U	Split-Replaced	< 0.245	U	< 0.356	U	Split-Replaced	< 0.177	U	< 0.347	U	Split-Replaced	< 0.107	U	< 0.157	U	Split-Replaced
08A-0067-C2FS	< 1.43	U	< 1.43	U	ND or <QL	< 0.497	UJ	< 0.497	UJ	ND or <QL	< 0.208	U	< 0.208	U	ND or <QL	< 0.117	U	< 0.117	U	ND or <QL	< 0.130	U	< 0.130	U	ND or <QL
08A-0068-C1AS	544	J	697	JF	*1.281	540	J	772	JF	*1.430	15.1	J	15.1	J	ND or <QL	6.13	J	6.13	J	ND or <QL	124	J	155	JF	*1.250
08A-0068-C1BS	604	J	774	JF	*1.281	584	J	835	JF	*1.430	22.5	J	22.5	J	ND or <QL	6	J	6	J	ND or <QL	124	J	155	JF	*1.250
08A-0068-C1CS	326		418	F	*1.282	249		356	F	*1.430	7.8	J	7.8	J	ND or <QL	3.76	J	3.76	J	ND or <QL	41.8		52.3	F	*1.251
08A-0068-C1DS	110		141	F	*1.282	153		219	F	*1.431	7.79	J	7.79	J	ND or <QL	1.13	J	1.13	J	ND or <QL	28.6		35.8	F	*1.252
08A-0068-C1ES	< 6.26	U	< 6.26	U	ND or <QL	5.59	J	5.59	J	ND or <QL	< 0.192	U	< 0.192	U	ND or <QL	< 0.111	U	< 0.111	U	ND or <QL	1.86	J	1.86	J	ND or <QL
08A-0068-C1ET	< 7.71	U	< 7.71	U	ND or <QL	11	J	11	J	ND or <QL	1.08	J	1.08	J	ND or <QL	< 0.148	U	< 0.148	U	ND or <QL	3.41	J	3.41	J	ND or <QL
08A-0069-C1AS	431	J	553	JF	*1.283	455	J	650	JF	*1.429	14	J	14	J	ND or <QL	4.82	J	4.82	J	ND or <QL	88	J	110	JF	*1.250
08A-0069-C1BS	1240	J	1590	JF	*1.282	1900	J	2720	JF	*1.432	43.5	J	66.9	JF	*1.538	11.9	J	11.9	J	ND or <QL	367	J	459	JF	*1.251
08A-0069-C1CS	909	J	1170	JF	*1.287	1210	J	1730	JF	*1.430	29.7	J	29.7	J	ND or <QL	8.45	J	8.45	J	ND or <QL	182	J	227	JF	*1.247
08A-0069-C1DS	117		150	F	*1.282	464		663	F	*1.429	42		64.6	F	*1.538	1.54	J	1.54	J	ND or <QL	85.3		107	F	*1.254
08A-0069-C1ES	< 4.62	U	< 4.62	U	ND or <QL	17.2	J	17.2	J	ND or <QL	1.54	J	1.54	J	ND or <QL	< 0.174	U	< 0.174	U	ND or <QL	4.82	J	4.82	J	ND or <QL
08A-0070-C3CS	83.9		108	F	*1.287	39.3		56.2	F	*1.430	1.39	J	1.39	J	ND or <QL	0.633	J	0.633	J	ND or <QL	8.07	J	8.07	J	ND or <QL
08A-0070-C3DS	54.8		70.3	F	*1.283	22.6		32.3	F	*1.429	0.907	J	0.907	J	ND or <QL	0.424	J	0.424	J	ND or <QL	5.08	J	5.08	J	ND or <QL
08A-0070-C3ES	113		145	F	*1.283	155		221	F	*1.426	7.09	J	7.09	J	ND or <QL	1.27	J	1.27	J	ND or <QL	29.5		36.9	F	*1.251
08A-0071-C1AS	31.3		40.1	F	*1.281	26.5		37.9	F	*1.430	0.891	J	0.891	J	ND or <QL	0.514	J	0.514	J	ND or <QL	3.61	J	3.61	J	ND or <QL
08A-0071-C1BS	18.8		24.1	F	*1.282	9.53	J	9.53	J	ND or <QL	0.489	J	0.489	J	ND or <QL	0.313	J	0.313	J	ND or <QL	2.43	J	2.43	J	ND or <QL
08A-0071-C1CS	6.76	J	6.76	J	ND or <QL	7.8	J	7.8	J	ND or <QL	1.21	J	1.21	J	ND or <QL	< 0.110	U	< 0.110	U	ND or <QL	3.79	J	3.79	J	ND or <QL
08A-0072-C6AS	56.2		72	F	*1.281	34.8		49.7	F	*1.428	1.41	J	1.41	J	ND or <QL	0.596	J	0.596	J	ND or <QL	5.22	J	5.22	J	ND or <QL
08A-0073-C4AS	224	J	287	JF	*1.281	303	J	433	JF	*1.429	12.3	J	12.3	J	ND or <QL	< 2.22	UJ	< 2.22	UJ	ND or <QL	80.3	J	100	JF	*1.245
08A-0073-C4BS	1090	J	1400	JF	*1.284	1120	J	1600	JF	*1.429	31.7	J	31.7	J	ND or <QL	12.8	J	12.8	J	ND or <QL	260	J	325	JF	*1.250
08A-0073-C4CS	128		164	F	*1.281	118		169	F	*1.432	7.76	J	7.76	J	ND or <QL	1.21	J	1.21	J	ND or <QL	29		36.3	F	*1.252
08A-0074-C2AS	300	J	385	JF	*1.283	174	J	249	JF	*1.431	6.52	J	6.52	J	ND or <QL	3.7	J	3.7	J	ND or <QL	33.3	J	33.3	J	ND or <QL
08A-0074-C2BS	218	J	279	JF	*1.280	139	J	199	JF	*1.432	4.98	J	4.98	J	ND or <QL	2.55	J	2.55	J	ND or <QL	28.9	J	28.9	J	ND or <QL
08A-0074-C2CS	208	J	267	JF	*1.284	214	J	306	JF	*1.430	7.38	J	7.38	J	ND or <QL	3.1	J	3.1	J	ND or <QL	52	J	65	JF	*1.250
08A-0074-C2DS	76.9		98.6	F	*1.282	42		60	F	*1.429	1.72	J	1.72	J	ND or <QL	1.09	J	1.09	J	ND or <QL	10	J	10	J	ND or <QL
08A-0074-C2ES	765		981	F	*1.282	322		460	F	*1.429	29.5	J	29.5	J	ND or <QL	6.52	J	6.52	J	ND or <QL	75.4		94.3	F	*1.251
08A-0074-C2FS	181	J	232	JF	*1.282	79.9	J	114	JF	*1.427	3.21	J	3.21	J	ND or <QL	1.61	J	1.61	J	ND or <QL	17.5	J	17.5	J	ND or <QL
08A-0074-C2GS	968		1240	F	*1.281	697		996	F	*1.429	24.7	J	24.7	J	ND or <QL	9.43	J	9.43	J	ND or <QL	155		194	F	*1.252
08A-0075-C1AS	52.8		67.7	F	*1.282	27.9		39.9	F	*1.430	1.41	J	1.41	J	ND or <QL	0.672	J	0.672	J	ND or <QL	5.96	J	5.96	J	ND or <QL
08A-0075-C1BS	71.1		91.2	F	*1.283	37.3		53.3	F	*1.429	1.5	J	1.5	J	ND or <QL	0.78	J	0.78	J	ND or <QL	8.26	J	8.26	J	ND or <QL
08A-0076-C5AS	704	J	903	JF	*1.283	249	J	356	JF	*1.430	9.94	J	9.94	J	ND or <QL	3.05	J	3.05	J	ND or <QL	34	J	34	J	ND or <QL
08A-0076-C5BS	27.6		35.4	F	*1.283	10.1	J	10.1	J	ND or <QL	0.564	J	0.564	J	ND or <QL	0.236	J	0.236	J	ND or <QL	1.83	J	1.83	J	ND or <QL
08A-0076-C5CS	< 10.1	U	< 10.1	U	ND or <QL	< 2.76	U	< 2.76	U	ND or <QL	< 0.161	U	< 0.161	U	ND or <QL	< 0.177	U	< 0.177	U	ND or <QL	< 0.538	U	< 0.538	U	ND or <QL
08A-0077-C2AS	447	J	573	JF	*1.282	440	J	629	JF	*1.430	12.5	J	12.5	J	ND or <QL	4.57	J	4.57	J	ND or <QL	99.7	J	125	JF	*1.254
08A-0077-C2BS	684		877	F	*1.282	610		872	F	*1.430	18.2	J	18.2	J	ND or <QL	7.04	J	7.04	J	ND or <QL	155		194	F	*1.252
08A-0077-C2CS	1720		2210	F	*1.285	1910		2730	F	*1.429	58.3		89.7	F	*1.539	14.6	J	14.6	J	ND or <QL	483		604	F	*1.251
08A-0077-C2DS	< 1.42	U	< 1.42	U	ND or <QL	< 1.32	U	< 1.32	U	ND or <QL	< 0.370	U	< 0.370	U	ND or <QL	< 0.179	U	< 0.179	U	ND or <QL	< 0.432	UJ	< 0.432	UJ	ND or <QL
08A-0078-C1AS	106		136	F	*1.283	41.6		59.4	F	*1.428	1.9	J	1.9	J	ND or <QL	1.51	J	1.51	J	ND or <QL	7.89	J	7.89	J	ND or <QL
08A-0078-C1BS	138		177	F	*1.283	75.7		108	F	*1.427	2.56	J	2.56	J	ND or <QL	1.43	J	1.43	J	ND or <QL	14.8	J	14.8	J	ND or <QL
08A-0078-C1CS	289		370	F	*1.280	108		154	F	*1.426	4.03	J	4.03	J	ND or <QL	2.01	J	2.01	J	ND or <QL	15.5	J	15.5	J	ND or <QL
08A-0078-C1DS	873		1120	F	*1.283	375		536	F	*1.429	13	J	13	J	ND or <QL	5.22	J	5.22	J	ND or <QL	80.5		101	F	*1.255
08A-0078-C1ES	643		824	F	*1.281	208		297	F	*1.428	9.53	J	9.53	J	ND or <QL	3.23	J	3.23	J	ND or <QL	33.6		42	F	*1.250
08A-0078-C1FS	307		394	F	*1.283	158		226	F	*1.430	6.1	J	6.1	J	ND or <QL	2.53	J	2.53	J	ND or <QL	26.2	J	26.2	J	ND or <QL
08A-0078-C1GS	1130		1450	F	*1.283	611		873	F	*1.429	19.4	J	19.4	J	ND or <QL	5.28	J	5.28	J	ND or <QL	86.7		108	F	*1.246
08A-0078-D4AS	109		140	F	*1.284	47.9		68.4	F	*1.428	1.74	J	1.74	J	ND or <QL	1.32	J	1.32	J	ND or <QL	8.5	J	8.5	J	ND or <QL
08A-0078-D4BS	115		147	F	*1.278	53		75.7	F	*1.428	1.74	J	1.74	J	ND or <QL	1.15	J	1.15	J	ND or <QL	5.04	J	5.04	J	ND or <QL
08A-0078-D4CS	42.9		55	F	*1.282	11.5	J	11.5	J	ND or <QL	0.581	J	0.581	J	ND or <QL	0.493	J	0.493	J	ND or <QL	3.18	J	3.18	J	ND or <QL
08A-0078-D4DS	103		132	F	*1.282	31.2		44.6	F	*1.429	1.23	J	1.23	J	ND or <QL	0.786	J	0.786	J	ND or <QL	3.48	J	3.48	J	ND or <QL
08A-0078-D4ES	481		617	F	*1.283	164		234	F	*1.427	6.14	J	6.14	J	ND or <QL	4.3	J	4.3	J	ND or <QL	30.9		38.6	F	*1.249</

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,4,6,7,8-HpCDD 35822-46-9 ng/kg					1,2,3,4,6,7,8-HpCDF 67562-39-4 ng/kg					1,2,3,4,7,8,9-HpCDF 55673-89-7 ng/kg					1,2,3,4,7,8-HxCDD 39227-28-6 ng/kg					1,2,3,4,7,8-HxCDF 70648-26-9 ng/kg				
	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0079-C4AS	63.9		81.9	F	*1.282	25.9		37	F	*1.429	2.15	J	2.15	J	ND or <QL	1.45	J	1.45	J	ND or <QL	11.7	J	11.7	J	ND or <QL
08A-0079-C4BS	117		150	F	*1.282	26.6		38	F	*1.429	1.28	J	1.28	J	ND or <QL	0.555	J	0.555	J	ND or <QL	4.93	J	4.93	J	ND or <QL
08A-0079-C4CS	203		260	F	*1.281	76.3		109	F	*1.429	3.45	J	3.45	J	ND or <QL	1.38	J	1.38	J	ND or <QL	11.8	J	11.8	J	ND or <QL
08A-0079-C4DS	139		178	F	*1.281	56.3		80.5	F	*1.430	2.21	J	2.21	J	ND or <QL	1.66	J	1.66	J	ND or <QL	7.8	J	7.8	J	ND or <QL
08A-0079-C4ES	121		155	F	*1.281	36.6		52.3	F	*1.429	1.65	J	1.65	J	ND or <QL	0.667	J	0.667	J	ND or <QL	7.08	J	7.08	J	ND or <QL
08A-0080-C1AS	101		129	F	*1.277	34.6		49.4	F	*1.428	1.53	J	1.53	J	ND or <QL	1.07	J	1.07	J	ND or <QL	6.09	J	6.09	J	ND or <QL
08A-0080-C1BS	69.3		88.8	F	*1.281	26		37.2	F	*1.431	1.38	J	1.38	J	ND or <QL	0.601	J	0.601	J	ND or <QL	4.57	J	4.57	J	ND or <QL
08A-0080-C1CS	57.3		73.5	F	*1.283	21.3		30.4	F	*1.427	1.03	J	1.03	J	ND or <QL	0.501	J	0.501	J	ND or <QL	4.04	J	4.04	J	ND or <QL
08A-0080-C1DS	264		338	F	*1.280	157		224	F	*1.427	4.54	J	4.54	J	ND or <QL	1.92	J	1.92	J	ND or <QL	18.4	J	18.4	J	ND or <QL
08A-0080-C1ES	85.3		109	F	*1.278	42		60	F	*1.429	1.81	J	1.81	J	ND or <QL	0.875	J	0.875	J	ND or <QL	9.94	J	9.94	J	ND or <QL
08A-0081-C2AS	97.7		125	F	*1.279	22		31.4	F	*1.427	1.59	J	1.59	J	ND or <QL	0.808	J	0.808	J	ND or <QL	3.31	J	3.31	J	ND or <QL
08A-0081-C2BS	< 9.50	U	< 9.50	U	ND or <QL	< 3.51	U	< 3.51	U	ND or <QL	< 0.138	UJ	< 0.138	UJ	ND or <QL	< 0.111	U	< 0.111	U	ND or <QL	< 0.550	U	< 0.550	U	ND or <QL
08A-0081-C2CS	23.5		30.1	F	*1.281	13.1	J	13.1	J	ND or <QL	0.473	J	0.473	J	ND or <QL	0.231	J	0.231	J	ND or <QL	1.76	J	1.76	J	ND or <QL
08A-0081-C2DS	41.9		53.7	F	*1.282	12.1		17.3	F	*1.430	0.547	J	0.547	J	ND or <QL	0.225	J	0.225	J	ND or <QL	1.88	J	1.88	J	ND or <QL
08A-0082-C2AS	158		203	F	*1.285	50.4		72	F	*1.429	1.98	J	1.98	J	ND or <QL	1.75	J	1.75	J	ND or <QL	5.54	J	5.54	J	ND or <QL
08A-0082-C2BS	351		450	F	*1.282	91.9		131	F	*1.425	4	J	4	J	ND or <QL	2.68	J	2.68	J	ND or <QL	11	J	11	J	ND or <QL
08A-0082-C2CS	438		562	F	*1.283	112		160	F	*1.429	5.23	J	5.23	J	ND or <QL	4.11	J	4.11	J	ND or <QL	16.2	J	16.2	J	ND or <QL
08A-0082-C2DS	191		245	F	*1.283	46.6		66.6	F	*1.429	1.93	J	1.93	J	ND or <QL	1.51	J	1.51	J	ND or <QL	6.66	J	6.66	J	ND or <QL
08A-0082-C2ES	745	J	955	JF	*1.282	119		170	F	*1.429	5.81	J	5.81	J	ND or <QL	3.12	J	3.12	J	ND or <QL	20.5		25.6	F	*1.249
08A-0082-C2FS	721		924	F	*1.282	147		210	F	*1.429	6.45	J	6.45	J	ND or <QL	4.13	J	4.13	J	ND or <QL	23.3		29.1	F	*1.249
08A-0082-C2FT	866		1110	F	*1.282	166		237	F	*1.428	8.11	J	8.11	J	ND or <QL	4.57	J	4.57	J	ND or <QL	21.9	J	21.9	J	ND or <QL
08A-0082-C2GS	749		960	F	*1.282	159		227	F	*1.428	8.24	J	8.24	J	ND or <QL	3.58	J	3.58	J	ND or <QL	23.8		29.8	F	*1.252
08A-0082-C2HS	1760		2260	F	*1.284	303		433	F	*1.429	14.8	J	14.8	J	ND or <QL	7.59	J	7.59	J	ND or <QL	41.6		52	F	*1.250
08A-0082-C2IS	1520		1950	F	*1.283	286		409	F	*1.430	12	J	12	J	ND or <QL	5.89	J	5.89	J	ND or <QL	44.5		55.6	F	*1.249
08A-0082-C2JS	699		896	F	*1.282	213		304	F	*1.427	8.85	J	8.85	J	ND or <QL	4.19	J	4.19	J	ND or <QL	29.4		36.8	F	*1.252
08A-0082-C2KS	370		474	F	*1.281	100		143	F	*1.430	4.17	J	4.17	J	ND or <QL	2.02	J	2.02	J	ND or <QL	14.8	J	14.8	J	ND or <QL
08A-0083-C2AS	37.4		47.9	F	*1.281	13.4	J	13.4	J	ND or <QL	0.722	J	0.722	J	ND or <QL	0.505	J	0.505	J	ND or <QL	2.15	J	2.15	J	ND or <QL
08A-0083-C2BS	49.8		63.8	F	*1.281	16.6	J	16.6	J	ND or <QL	0.763	J	0.763	J	ND or <QL	0.478	J	0.478	J	ND or <QL	1.84	J	1.84	J	ND or <QL
08A-0083-C2CS	24.4		31.3	F	*1.283	8.29	J	8.29	J	ND or <QL	0.472	J	0.472	J	ND or <QL	0.353	J	0.353	J	ND or <QL	1.71	J	1.71	J	ND or <QL
08A-0083-C2DS	38.3		49.1	F	*1.282	13.9	J	13.9	J	ND or <QL	1.33	J	1.33	J	ND or <QL	0.861	J	0.861	J	ND or <QL	7.45	J	7.45	J	ND or <QL
08A-0083-C2ES	23.5		30.1	F	*1.281	10.2	J	10.2	J	ND or <QL	0.671	J	0.671	J	ND or <QL	0.331	J	0.331	J	ND or <QL	3.35	J	3.35	J	ND or <QL
08A-0084-C1AS	44		56.4	F	*1.282	17		24.3	F	*1.429	1.09	J	1.09	J	ND or <QL	< 0.271	U	< 0.271	U	ND or <QL	2.4	J	2.4	J	ND or <QL
08A-0084-C1BS	17.6	J	17.6	J	ND or <QL	7.04	J	7.04	J	ND or <QL	< 0.273	U	< 0.273	U	ND or <QL	< 0.263	U	< 0.263	U	ND or <QL	1.22	J	1.22	J	ND or <QL
08A-0084-C1BT	37.6	J	48.2	JF	*1.282	12.1	J	12.1	J	ND or <QL	0.612	J	0.612	J	ND or <QL	0.263	J	0.263	J	ND or <QL	1.53	J	1.53	J	ND or <QL
08A-0084-C1CS	1290	J	1650	JF	*1.279	282	J	403	JF	*1.429	16.6	J	16.6	J	ND or <QL	6.21	J	6.21	J	ND or <QL	36.5	J	45.6	JF	*1.249
08A-0084-C1DS	775	J	994	JF	*1.283	185		264	F	*1.427	8.94	J	8.94	J	ND or <QL	5.11	J	5.11	J	ND or <QL	31.1		38.9	F	*1.251
08A-0084-C1ES	1460		1380	BD	Split-Replaced	247		276	BD	Split-Replaced	13.9	J	19.4	BDJ	Split-Replaced	6.55	J	8.87	BDJ	Split-Replaced	35.9	J	33.7	BD	Split-Replaced
08A-0084-C1FS	1410		1510	B	Split-Replaced	270		386	B	Split-Replaced	12.4	J	23.6	B	Split-Replaced	7.1	J	13	B	Split-Replaced	42.9		47.3	B	Split-Replaced
08A-0084-C1GS	276		354	F	*1.283	94.6		135	F	*1.427	4.37	J	4.37	J	ND or <QL	1.92	J	1.92	J	ND or <QL	17.5	J	17.5	J	ND or <QL
08A-0085-C1AS	62.7		80.4	F	*1.282	17.8	J	17.8	J	ND or <QL	1	J	1	J	ND or <QL	0.858	J	0.858	J	ND or <QL	3.1	J	3.1	J	ND or <QL
08A-0085-C1BS	77.7		99.6	F	*1.282	19.6	J	19.6	J	ND or <QL	1.09	J	1.09	J	ND or <QL	0.791	J	0.791	J	ND or <QL	2.71	J	2.71	J	ND or <QL
08A-0085-C1CS	458		587	F	*1.282	133		190	F	*1.429	5.84	J	5.84	J	ND or <QL	3.02	J	3.02	J	ND or <QL	19.2	J	19.2	J	ND or <QL
08A-0085-C1DS	169		217	F	*1.284	71.6		102	F	*1.425	3.16	J	3.16	J	ND or <QL	1.28	J	1.28	J	ND or <QL	7.78	J	7.78	J	ND or <QL
08A-0085-C1ES	714		915	F	*1.282	320	J	457	JF	*1.428	12.4	J	12.4	J	ND or <QL	6.27	J	6.27	J	ND or <QL	32.2	J	40.3	JF	*1.252
08A-0085-C1FS	158		203	F	*1.285	119	J	170	JF	*1.429	3.69	J	3.69	J	ND or <QL	1.31	J	1.31	J	ND or <QL	8.93	J	8.93	J	ND or <QL
08A-0085-C1FT	177		227	F	*1.282	308	J	440	JF	*1.429	5.01	J	5.01	J	ND or <QL	1.13	J	1.13	J	ND or <QL	12.1	J	12.1	J	ND or <QL
08A-0085-C1GS	937	J	1200	JF	*1.281	433	J	619	JF	*1.430	15.3	J	15.3	J	ND or <QL	4.83	J	4.83	J	ND or <QL	29.6	J	29.6	J	ND or <QL
08A-0085-C1HS	193		247	F	*1.280	158		226	F	*1.430	6.47	J	6.47	J	ND or <QL	1.53	J	1.53	J	ND or <QL	16.2	J	16.2	J	ND or <QL
08A-0085-C1IS	12.6	J	12.6	J	ND or <QL	23.1		33	F	*1.429	2.94	J	2.94	J	ND or <QL	0.283	J	0.283	J	ND or <QL	6.59	J	6.59	J	ND or <QL
08A-0085-C1JS	< 1.91	U	< 1.91	U	ND or <QL	1.93	J	1.93	J	ND or <QL	< 0.177	UJ	< 0.177	UJ	ND or <QL	< 0.127	U	< 0.127	U	ND or <QL	1.05	J	1.05	J	ND or <QL
08A-0086-C3AS	24.9		31.9	F	*1.281	9.44	J	9.44	J	ND or <QL	< 0.694	UJ	< 0.694	UJ	ND or <QL	0.359	J	0.359	J	ND or <QL	2.05	J	2.05	J	ND or <QL
08A-0086-C3BS	6.54	J	6.54	J	ND or <QL	2.86	J	2.86	J	ND or <QL	< 0.0652	UJ	< 0.0652	UJ	ND or <QL	< 0.0603	U	< 0.0603	U	ND or <QL	0.397	J	0.397	J	ND or <QL
08A-0086-C3BT	6.32	J	6.32	J	ND or <QL	3.44	J	3.44	J	ND or <QL	0.364	J	0.364	J	ND or <QL	< 0.0549	U	< 0.0549	U	ND or <QL	1.1	J	1.1	J	ND or <QL

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,4,6,7,8-HpCDD 35822-46-9 ng/kg					1,2,3,4,6,7,8-HpCDF 67562-39-4 ng/kg					1,2,3,4,7,8,9-HpCDF 55673-89-7 ng/kg					1,2,3,4,7,8-HxCDD 39227-28-6 ng/kg					1,2,3,4,7,8-HxCDF 70648-26-9 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0086-C3CS	< 1.46	U	< 1.46	U	ND or <QL	< 0.630	U	< 0.630	U	ND or <QL	0.0954	J	0.0954	J	ND or <QL	< 0.0517	U	< 0.0517	U	ND or <QL	< 1.04	U	< 1.04	U	ND or <QL
08A-0086-C3DS	< 0.840	U	< 0.840	U	ND or <QL	< 0.147	U	< 0.147	U	ND or <QL	< 0.147	UJ	< 0.147	UJ	ND or <QL	< 0.0892	U	< 0.0892	U	ND or <QL	< 0.0770	U	< 0.0770	U	ND or <QL
08A-0086-C3ES	< 0.286	U	< 0.286	U	ND or <QL	< 0.0963	U	< 0.0963	U	ND or <QL	< 0.0509	UJ	< 0.0509	UJ	ND or <QL	< 0.0644	U	< 0.0644	U	ND or <QL	< 0.0383	U	< 0.0383	U	ND or <QL
08A-0087-C3AS	14.1	J	14.1	J	ND or <QL	5.73	J	5.73	J	ND or <QL	0.284	J	0.284	J	ND or <QL	0.177	J	0.177	J	ND or <QL	0.745	J	0.745	J	ND or <QL
08A-0087-C3BS	< 0.897	U	< 0.897	U	ND or <QL	< 0.344	U	< 0.344	U	ND or <QL	< 0.0486	UJ	< 0.0486	UJ	ND or <QL	< 0.0479	U	< 0.0479	U	ND or <QL	< 0.0416	U	< 0.0416	U	ND or <QL
08A-0087-C3CS	< 1.18	U	< 1.18	U	ND or <QL	< 0.219	U	< 0.219	U	ND or <QL	< 0.0986	UJ	< 0.0986	UJ	ND or <QL	< 0.0974	U	< 0.0974	U	ND or <QL	< 0.0727	U	< 0.0727	U	ND or <QL
08A-0087-C3DS	< 1.01	U	< 1.01	U	ND or <QL	< 0.0630	UJ	< 0.0630	UJ	ND or <QL	< 0.0446	UJ	< 0.0446	UJ	ND or <QL	< 0.0404	U	< 0.0404	U	ND or <QL	< 0.0301	U	< 0.0301	U	ND or <QL
08A-0088-C1AS	8.4	J	8.4	J	ND or <QL	2.95	J	2.95	J	ND or <QL	< 0.216	UJ	< 0.216	UJ	ND or <QL	0.123	J	0.123	J	ND or <QL	0.355	J	0.355	J	ND or <QL
08A-0088-C1BS	< 0.398	U	< 0.398	U	ND or <QL	< 0.0780	U	< 0.0780	U	ND or <QL	< 0.0843	UJ	< 0.0843	UJ	ND or <QL	< 0.0378	U	< 0.0378	U	ND or <QL	< 0.0357	U	< 0.0357	U	ND or <QL
08A-0088-C1CS	< 0.692	U	< 0.692	U	ND or <QL	< 0.154	U	< 0.154	U	ND or <QL	< 0.106	UJ	< 0.106	UJ	ND or <QL	< 0.0967	U	< 0.0967	U	ND or <QL	< 0.0718	U	< 0.0718	U	ND or <QL
08A-0089-C2AS	147		188	F	*1.279	23.3		33.3	F	*1.429	0.879	J	0.879	J	ND or <QL	0.694	J	0.694	J	ND or <QL	3.93	J	3.93	J	ND or <QL
08A-0089-C2BS	41.1		34.7	B	Split-Replaced	11.4	J	17.7	B	Split-Replaced	0.57	J	3.32	BJ	Split-Replaced	0.492	J	< 0.730	U	Split-Replaced	1.95	J	4.92	BJ	Split-Replaced
08A-0089-C2CS	34.4		60.9	B	Split-Replaced	9.73	J	18.7	B	Split-Replaced	0.665	J	< 1.07	U	Split-Replaced	0.328	J	1.75	BJ	Split-Replaced	2.13	J	2.85	BJ	Split-Replaced
08A-0089-C2DS	23.2		29.7	F	*1.280	11.4	J	11.4	J	ND or <QL	0.598	J	0.598	J	ND or <QL	0.317	J	0.317	J	ND or <QL	2.16	J	2.16	J	ND or <QL
08A-0089-C2ES	20.3		26	F	*1.281	10.6	J	10.6	J	ND or <QL	0.531	J	0.531	J	ND or <QL	0.309	J	0.309	J	ND or <QL	0.924	J	0.924	J	ND or <QL
08A-0090-C5AS	26.9		34.5	F	*1.283	21.4		30.6	F	ND or <QL	0.706	J	0.706	J	ND or <QL	0.325	J	0.325	J	ND or <QL	2.25	J	2.25	J	ND or <QL
08A-0090-C5BS	< 3.00	U	< 3.00	U	ND or <QL	< 4.04	U	< 4.04	U	ND or <QL	0.164	J	0.164	J	ND or <QL	0.0989	J	0.0989	J	ND or <QL	< 0.971	U	< 0.971	U	ND or <QL
08A-0092-C1AS	157		201	F	*1.280	21.8	J	31.2	JF	*1.431	2.53	J	2.53	J	ND or <QL	1.61	J	1.61	J	ND or <QL	1.34	J	1.34	J	ND or <QL
08A-0096-C3AS	69.7		89.4	F	*1.283	24.9		35.6	F	*1.430	1.19	J	1.19	J	ND or <QL	0.936	J	0.936	J	ND or <QL	3.16	J	3.16	J	ND or <QL
08A-0096-C3BS	174		223	F	*1.282	62.8		89.7	F	*1.428	2.9	J	2.9	J	ND or <QL	1.47	J	1.47	J	ND or <QL	11.2	J	11.2	J	ND or <QL
08A-0098-C1AS	356		456	F	*1.281	77.7		111	F	*1.429	4.99	J	4.99	J	ND or <QL	1.73	J	1.73	J	ND or <QL	8.88	J	8.88	J	ND or <QL
08A-0098-C1BS	257		329	F	*1.280	75.5		108	F	*1.430	3.83	J	3.83	J	ND or <QL	1.73	J	1.73	J	ND or <QL	11.6	J	11.6	J	ND or <QL
08A-0098-C1CS	388	J	497	JF	*1.281	770	J	1100	JF	*1.429	22.2	J	22.2	J	ND or <QL	2.75	J	2.75	J	ND or <QL	35.2	J	44	JF	*1.250
08A-0098-C1DS	16.6	J	16.6	J	ND or <QL	43	J	61.4	JF	*1.428	4.41	J	4.41	J	ND or <QL	< 0.483	UJ	< 0.483	UJ	ND or <QL	< 12.2	UJ	< 12.2	UJ	ND or <QL
08A-0098-C1ES	23.8	J	26.9	B	Split-Replaced	43.7	J	62	B	Split-Replaced	4.2	J	6.64	BJ	Split-Replaced	< 0.952	UJ	1.2	BJ	Split-Replaced	14.2	J	12.8	B	Split-Replaced
08A-0098-C1FS	35.2	J	39.2	B	Split-Replaced	43.2	J	38.6	B	Split-Replaced	13.9	J	14.7	B	Split-Replaced	< 0.947	UJ	1.49	BJ	Split-Replaced	41.9	J	33.3	B	Split-Replaced
08A-0098-C1GS	33.7	J	43.2	JF	*1.282	41	J	58.6	JF	*1.429	19.1	J	19.1	J	ND or <QL	< 0.804	UJ	< 0.804	UJ	ND or <QL	57.9	J	72.4	JF	*1.250
08A-0099-C1AS	38.1		48.8	F	*1.281	14.3		20.4	F	*1.427	0.669	J	0.669	J	ND or <QL	0.424	J	0.424	J	ND or <QL	< 2.41	U	< 2.41	U	ND or <QL
08A-0099-C1BS	237		304	F	*1.283	59		84.3	F	*1.429	3.01	J	3.01	J	ND or <QL	2.2	J	2.2	J	ND or <QL	8.39	J	8.39	J	ND or <QL
08A-0099-C1CS	1920	J	2460	JF	*1.281	250	J	357	JF	*1.428	13.3	J	13.3	J	ND or <QL	10.4	J	10.4	J	ND or <QL	27.9	J	27.9	J	ND or <QL
08A-0099-C1DS	700	J	897	JF	*1.281	191	J	273	JF	*1.429	9.85	J	9.85	J	ND or <QL	6.3	J	6.3	J	ND or <QL	31.2	J	31.2	J	ND or <QL
08A-0099-C1ES	1320		1690	F	*1.280	311		444	F	*1.428	12.7	J	12.7	J	ND or <QL	5.71	J	5.71	J	ND or <QL	27.1		33.9	F	*1.251
08A-0099-C1FS	34.6		44.4	F	*1.283	< 14.8	U	< 14.8	U	ND or <QL	3.99	J	3.99	J	ND or <QL	< 0.630	UJ	< 0.630	UJ	ND or <QL	14.7	J	14.7	J	ND or <QL
08A-0100-C1AS	39.5		50.6	F	*1.281	13.1		18.7	F	*1.427	0.787	J	0.787	J	ND or <QL	0.409	J	0.409	J	ND or <QL	< 2.28	U	< 2.28	U	ND or <QL
08A-0100-C1BS	30.1	J	30.1	J	ND or <QL	< 6.36	UJ	< 6.36	UJ	ND or <QL	1.27	J	1.27	J	ND or <QL	< 0.32	UJ	< 0.32	UJ	ND or <QL	< 8.07	UJ	< 8.07	UJ	ND or <QL
08A-0100-C1CS	18.9		24.2	F	*1.280	< 0.211	U	< 0.211	U																

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,4,6,7,8-HpCDD 35822-46-9 ng/kg					1,2,3,4,6,7,8-HpCDF 67562-39-4 ng/kg					1,2,3,4,7,8,9-HpCDF 55673-89-7 ng/kg					1,2,3,4,7,8-HxCDD 39227-28-6 ng/kg					1,2,3,4,7,8-HxCDF 70648-26-9 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0104-C1DS	8.86	J	8.86	J	ND or <QL	10.6	J	10.6	J	ND or <QL	1.15	J	1.15	J	ND or <QL	< 0.203	UJ	< 0.203	UJ	ND or <QL	< 3.91	UJ	< 3.91	UJ	ND or <QL
08A-0104-C1ES	14.3	J	14.3	J	ND or <QL	41.9	J	59.9	JF	*1.430	1.97	J	1.97	J	ND or <QL	< 0.238	UJ	< 0.238	UJ	ND or <QL	< 7.27	UJ	< 7.27	UJ	ND or <QL
08A-0104-C1FS	11.8	J	11.8	J	ND or <QL	14.4	J	14.4	J	ND or <QL	2.78	J	2.78	J	ND or <QL	< 0.464	U	< 0.464	U	ND or <QL	11.2	J	11.2	J	ND or <QL
08A-0104-C1FT	< 3.87	UJ	< 3.87	UJ	ND or <QL	< 4.83	UJ	< 4.83	UJ	ND or <QL	1.09	J	1.09	J	ND or <QL	< 0.278	UJ	< 0.278	UJ	ND or <QL	< 5.33	UJ	< 5.33	UJ	ND or <QL
08A-0104-C1GS	< 4.78	UJ	< 4.78	UJ	ND or <QL	< 5.38	UJ	< 5.38	UJ	ND or <QL	1.58	J	1.58	J	ND or <QL	< 0.333	UJ	< 0.333	UJ	ND or <QL	< 8.05	UJ	< 8.05	UJ	ND or <QL
08A-0106-C1AS	< 5.60	U	< 5.60	U	ND or <QL	2.66	J	2.66	J	ND or <QL	0.211	J	0.211	J	ND or <QL	0.198	J	0.198	J	ND or <QL	0.889	J	0.889	J	ND or <QL
08A-0107-C2AS	7.86	J	7.86	J	ND or <QL	3.23	J	3.23	J	ND or <QL	< 0.163	U	< 0.163	U	ND or <QL	0.436	J	0.436	J	ND or <QL	0.928	J	0.928	J	ND or <QL
08A-0108-C1AS	65.1		83.5	F	*1.283	19.4	J	19.4	J	ND or <QL	1.22	J	1.22	J	ND or <QL	0.973	J	0.973	J	ND or <QL	3.49	J	3.49	J	ND or <QL
08A-0108-C1BS	37.5		48.1	F	*1.283	16.3	J	16.3	J	ND or <QL	1.32	J	1.32	J	ND or <QL	1.22	J	1.22	J	ND or <QL	3.87	J	3.87	J	ND or <QL
08A-0109-C3AS	69.4	J	89	JF	*1.282	< 1.62	UJ	< 1.62	UJ	ND or <QL	< 0.171	UJ	< 0.171	UJ	ND or <QL	< 0.207	UJ	< 0.207	UJ	ND or <QL	0.383	J	0.383	J	ND or <QL
08A-0109-C3BS	21.5	J	21.5	J	ND or <QL	< 0.263	U	< 0.263	U	ND or <QL	< 0.126	U	< 0.126	U	ND or <QL	< 0.166	U	< 0.166	U	ND or <QL	< 0.0740	U	< 0.0740	U	ND or <QL
08A-0109-C3CS	26.4		33.8	F	*1.280	< 1.16	UJ	< 1.16	UJ	ND or <QL	< 0.0741	U	< 0.0741	U	ND or <QL	< 0.151	U	< 0.151	U	ND or <QL	< 0.123	U	< 0.123	U	ND or <QL
08A-0109-C3DS	8.28	J	8.28	J	ND or <QL	< 0.237	U	< 0.237	U	ND or <QL	< 0.0835	U	< 0.0835	U	ND or <QL	< 0.0825	U	< 0.0825	U	ND or <QL	< 0.0601	U	< 0.0601	U	ND or <QL
08A-0109-C3ES	< 0.907	U	< 0.907	U	ND or <QL	< 0.213	UJ	< 0.213	UJ	ND or <QL	< 0.0632	U	< 0.0632	U	ND or <QL	< 0.0648	U	< 0.0648	U	ND or <QL	< 0.0569	U	< 0.0569	U	ND or <QL
08A-0109-C3ET	< 1.52	U	< 1.52	U	ND or <QL	< 0.283	UJ	< 0.283	UJ	ND or <QL	< 0.100	U	< 0.100	U	ND or <QL	< 0.105	U	< 0.105	U	ND or <QL	< 0.0776	U	< 0.0776	U	ND or <QL
08A-0110-C1AS	235		301	F	*1.281	96.2		137	F	*1.424	5.7	J	5.7	J	ND or <QL	2.77	J	2.77	J	ND or <QL	15	J	15	J	ND or <QL
08A-0110-C1BS	64.7		82.9	F	*1.281	39.3		56.2	F	*1.430	1.77	J	1.77	J	ND or <QL	0.974	J	0.974	J	ND or <QL	8.01	J	8.01	J	ND or <QL
08A-0110-C1CS	261		335	F	*1.284	149		213	F	*1.430	6.23	J	6.23	J	ND or <QL	3.52	J	3.52	J	ND or <QL	26.3	J	26.3	J	ND or <QL
08A-0110-C1DS	10	J	10	J	ND or <QL	< 6.81	UJ	< 6.81	UJ	ND or <QL	< 0.600	UJ	< 0.600	UJ	ND or <QL	< 0.331	UJ	< 0.331	UJ	ND or <QL	2.05	J	2.05	J	ND or <QL
08A-0110-C1ES	7.12	J	7.12	J	ND or <QL	< 0.409	U	< 0.409	U	ND or <QL	< 0.461	U	< 0.461	U	ND or <QL	< 0.285	U	< 0.285	U	ND or <QL	< 0.270	U	< 0.270	U	ND or <QL
08A-0110-C1FS	4.9	J	4.9	J	ND or <QL	< 0.942	U	< 0.942	U	ND or <QL	< 0.224	U	< 0.224	U	ND or <QL	< 0.0974	U	< 0.0974	U	ND or <QL	0.629	J	0.629	J	ND or <QL
08A-0110-C1GS	< 2.79	U	< 2.79	U	ND or <QL	< 0.189	U	< 0.189	U	ND or <QL	< 0.224	U	< 0.224	U	ND or <QL	< 0.146	U	< 0.146	U	ND or <QL	< 0.123	U	< 0.123	U	ND or <QL
08A-0111-C1AS	5.78	J	5.78	J	ND or <QL	2.14	J	2.14	J	ND or <QL	0.146	J	0.146	J	ND or <QL	0.0927	J	0.0927	J	ND or <QL	0.433	J	0.433	J	ND or <QL
08A-0111-C1BS	19.9		25.5	F	*1.281	4.83	J	4.83	J	ND or <QL	0.261	J	0.261	J	ND or <QL	0.279	J	0.279	J	ND or <QL	0.92	J	0.92	J	ND or <QL
08A-0111-C1CS	696		892	F	*1.282	147		210	F	*1.429	5.5	J	5.5	J	ND or <QL	1.88	J	1.88	J	ND or <QL	18.9	J	18.9	J	ND or <QL
08A-0111-C1DS	31.9		40.9	F	*1.282	14.8	J	14.8	J	ND or <QL	0.636	J	0.636	J	ND or <QL	0.369	J	0.369	J	ND or <QL	3.11	J	3.11	J	ND or <QL
08A-0112-C2AS	32.7		41.9	F	*1.281	11	J	11	J	ND or <QL	0.533	J	0.533	J	ND or <QL	0.368	J	0.368	J	ND or <QL	1.53	J	1.53	J	ND or <QL
08A-0112-C2BS	66.5		85.3	F	*1.283	23.8		34	F	*1.429	1.17	J	1.17	J	ND or <QL	0.507	J	0.507	J	ND or <QL	3.9	J	3.9	J	ND or <QL
08A-0112-C2CS	28.5		36.5	F	*1.281	10.1	J	10.1	J	ND or <QL	0.61	J	0.61	J	ND or <QL	0.41	J	0.41	J	ND or <QL	2.57	J	2.57	J	ND or <QL
08A-0112-C2DS	11.7	J	11.7	J	ND or <QL	5.55	J	5.55	J	ND or <QL	0.376	J	0.376	J	ND or <QL	0.111	J	0.111	J	ND or <QL	1.07	J	1.07	J	ND or <QL
08A-0113-C1AS	65.9		84.5	F	*1.282	25.3		36.2	F	*1.431	0.94	J	0.94	J	ND or <QL	0.465	J	0.465	J	ND or <QL	2.16	J	2.16	J	ND or <QL
08A-0113-C1BS	135		173	F	*1.281	44.5		63.6	F	*1.429	2.28	J	2.28	J	ND or <QL	1.44	J	1.44	J	ND or <QL	5.54	J	5.54	J	ND or <QL
08A-0113-C1CS	115	J	147	JF	*1.278	36.1	J	51.6	JF	*1.429	1.73	J	1.73	J	ND or <QL	1.56	J	1.56	J	ND or <QL	3.58	J	3.58	J	ND or <QL
08A-0114-C2AS	219		281	F	*1.283	352	J	503	JF	*1.429	31.6	J	48.6	JF	*1.538	2.39	J	2.39	J	ND or <QL	77.7		97.1	F	*1.250
08A-0114-C2BS	38.3		49.1	F	*1.282	9.39	J	9.39	J	ND or <QL	2.47	J	2.47	J	ND or <QL	2.08	J	2.08	J	ND or <QL	3.68	J	3.68	J	ND or <QL
08A-0114-C2CS	20.7		26.5	F	*1.280	3.81																			

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,4,6,7,8-HpCDD					1,2,3,4,6,7,8-HpCDF					1,2,3,4,7,8,9-HpCDF					1,2,3,4,7,8-HxCDD					1,2,3,4,7,8-HxCDF				
	35822-46-9					67562-39-4					55673-89-7					39227-28-6					70648-26-9				
	ng/kg					ng/kg					ng/kg					ng/kg					ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0118-C5AS	34.2		43.8	F	*1.281	8.38	J	8.38	J	ND or <QL	0.438	J	0.438	J	ND or <QL	0.523	J	0.523	J	ND or <QL	< 1.18	U	< 1.18	U	ND or <QL
08A-0118-C5CS	< 2.50	UJ	< 2.50	UJ	ND or <QL	< 0.486	UJ	< 0.486	UJ	ND or <QL	< 0.0798	UJ	< 0.0798	UJ	ND or <QL	< 0.106	U	< 0.106	U	ND or <QL	< 0.0501	U	< 0.0501	U	ND or <QL
08A-1070-C2AS	20.3		26	F	*1.281	9.42	J	9.42	J	ND or <QL	< 0.494	UJ	< 0.494	UJ	ND or <QL	0.301	J	0.301	J	ND or <QL	2.95	J	2.95	J	ND or <QL

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,6,7,8-HxCDD 57653-85-7 ng/kg					1,2,3,6,7,8-HxCDF 57117-44-9 ng/kg					1,2,3,7,8,9-HxCDD 19408-74-3 ng/kg					1,2,3,7,8,9-HxCDF 72918-21-9 ng/kg					1,2,3,7,8-PeCDD 40321-76-4 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0001-C1AS	13	J	13	J	ND or <QL	68.4	J	84.5	JF	*1.235	8.19	J	8.19	J	ND or <QL	< 0.473	UJ	< 0.473	UJ	ND or <QL	2.54	J	2.54	J	ND or <QL
08A-0001-C1BS	4.56	J	4.56	J	ND or <QL	7.16	J	7.16	J	ND or <QL	3.61	J	3.61	J	ND or <QL	< 0.412	UJ	< 0.412	UJ	ND or <QL	0.978	J	0.978	J	ND or <QL
08A-0001-C1CS	14	J	14	J	ND or <QL	29.6	J	29.6	J	ND or <QL	8.06	J	8.06	J	ND or <QL	< 1.22	UJ	< 1.22	UJ	ND or <QL	2.3	J	2.3	J	ND or <QL
08A-0001-C1DS	29.1	J	29.1	J	ND or <QL	41.8	J	51.6	JF	*1.234	20.3	J	20.3	J	ND or <QL	< 0.781	UJ	< 0.781	UJ	ND or <QL	6.24	J	6.24	J	ND or <QL
08A-0001-C1ES	17	J	17	J	ND or <QL	35.7	J	44.1	JF	*1.235	12.7	J	12.7	J	ND or <QL	< 0.826	UJ	< 0.826	UJ	ND or <QL	3.54	J	3.54	J	ND or <QL
08A-0001-C1FS	2.69	J	2.69	J	ND or <QL	< 4.11	UJ	< 4.11	UJ	ND or <QL	1.51	J	1.51	J	ND or <QL	< 0.249	UJ	< 0.249	UJ	ND or <QL	0.501	J	0.501	J	ND or <QL
08A-0001-C1FT	21.7	J	21.7	J	ND or <QL	38.2	J	47.2	JF	*1.236	13.2	J	13.2	J	ND or <QL	< 0.319	UJ	< 0.319	UJ	ND or <QL	3.43	J	3.43	J	ND or <QL
08A-0001-C1GS	24.1	J	24.1	J	ND or <QL	40.5		50	F	*1.235	15.3	J	15.3	J	ND or <QL	< 0.323	UJ	< 0.323	UJ	ND or <QL	4.24	J	4.24	J	ND or <QL
08A-0001-C1HS	23	J	23	J	ND or <QL	33.6		41.5	F	*1.235	13.1	J	13.1	J	ND or <QL	< 0.726	UJ	< 0.726	UJ	ND or <QL	4.32	J	4.32	J	ND or <QL
08A-0001-C1IS	23.7	J	23.7	J	ND or <QL	51		63	F	*1.235	11.5	J	11.5	J	ND or <QL	< 0.767	UJ	< 0.767	UJ	ND or <QL	6.23	J	6.23	J	ND or <QL
08A-0001-C1JS	22.1	J	22.1	J	ND or <QL	32		39.5	F	*1.234	12.3	J	12.3	J	ND or <QL	< 1.11	U	< 1.11	U	ND or <QL	3.35	J	3.35	J	ND or <QL
08A-0001-C1KS	26.9		39	F	*1.450	44.4		54.8	F	*1.234	15.8	J	15.8	J	ND or <QL	0.795	J	0.795	J	ND or <QL	4.55	J	4.55	J	ND or <QL
08A-0002-C1AS	< 0.180	UJ	< 0.180	UJ	ND or <QL	< 0.352	UJ	< 0.352	UJ	ND or <QL	< 0.136	UJ	< 0.136	UJ	ND or <QL	< 0.0995	UJ	< 0.0995	UJ	ND or <QL	< 0.0943	UJ	< 0.0943	UJ	ND or <QL
08A-0002-C1BS	0.349	J	0.349	J	ND or <QL	< 0.234	UJ	< 0.234	UJ	ND or <QL	< 0.127	UJ	< 0.127	UJ	ND or <QL	< 0.0789	UJ	< 0.0789	UJ	ND or <QL	< 0.0800	UJ	< 0.0800	UJ	ND or <QL
08A-0002-C1CS	0.753	J	0.753	J	ND or <QL	< 0.777	U	< 0.777	U	ND or <QL	0.9	J	0.9	J	ND or <QL	< 0.0528	U	< 0.0528	U	ND or <QL	0.217	J	0.217	J	ND or <QL
08A-0002-C1DS	< 0.109	U	< 0.109	U	ND or <QL	< 0.0260	U	< 0.0260	U	ND or <QL	< 0.0826	U	< 0.0826	U	ND or <QL	< 0.0324	U	< 0.0324	U	ND or <QL	< 0.0357	U	< 0.0357	U	ND or <QL
08A-0002-C1ES	< 0.102	U	< 0.222	U	Split-Replaced	< 0.0299	U	< 0.135	U	Split-Replaced	< 0.0796	U	< 0.302	U	Split-Replaced	< 0.0385	U	< 0.158	U	Split-Replaced	< 0.0594	U	< 0.218	U	Split-Replaced
08A-0002-C1FS	< 0.125	U	< 0.222	U	Split-Replaced	< 0.0299	U	< 0.168	U	Split-Replaced	< 0.0986	U	< 0.228	U	Split-Replaced	< 0.0381	U	< 0.382	U	Split-Replaced	< 0.0527	U	< 0.296	U	Split-Replaced
08A-0003-C1AS	20.9	J	20.9	J	ND or <QL	60.1	J	74.2	JF	*1.235	13	J	13	J	ND or <QL	0.724	J	0.724	J	ND or <QL	5.22	J	5.22	J	ND or <QL
08A-0003-C1BS	7.73	J	7.73	J	ND or <QL	18.9	J	18.9	J	ND or <QL	5.31	J	5.31	J	ND or <QL	0.263	J	0.263	J	ND or <QL	1.88	J	1.88	J	ND or <QL
08A-0003-C1CS	1.83	J	1.83	J	ND or <QL	2.51	J	2.51	J	ND or <QL	2.6	J	2.6	J	ND or <QL	< 0.661	UJ	< 0.661	UJ	ND or <QL	< 0.529	UJ	< 0.529	UJ	ND or <QL
08A-0003-C1DS	< 0.439	U	< 0.439	U	ND or <QL	< 0.423	U	< 0.423	U	ND or <QL	< 0.369	U	< 0.369	U	ND or <QL	< 0.432	U	< 0.432	U	ND or <QL	< 0.590	U	< 0.590	U	ND or <QL
08A-0003-C1ES	1.42	J	1.42	J	ND or <QL	< 1.52	U	< 1.52	U	ND or <QL	2.5	J	2.5	J	ND or <QL	< 0.191	U	< 0.191	U	ND or <QL	0.549	J	0.549	J	ND or <QL
08A-0003-C1FS	0.327	J	0.327	J	ND or <QL	< 0.152	U	< 0.152	U	ND or <QL	0.612	J	0.612	J	ND or <QL	< 0.0472	U	< 0.0472	U	ND or <QL	< 0.0746	U	< 0.0746	U	ND or <QL
08A-0003-C1GS	< 0.150	U	< 0.150	U	ND or <QL	< 0.0555	U	< 0.0555	U	ND or <QL	< 0.116	U	< 0.116	U	ND or <QL	< 0.0664	U	< 0.0664	U	ND or <QL	< 0.0910	U	< 0.0910	U	ND or <QL
08A-0003-C1HS	< 0.147	U	< 0.147	U	ND or <QL	< 0.0303	U	< 0.0303	U	ND or <QL	< 0.108	U	< 0.108	U	ND or <QL	< 0.0386	U	< 0.0386	U	ND or <QL	< 0.0963	U	< 0.0963	U	ND or <QL
08A-0004-C1AS	17.3	J	17.3	J	ND or <QL	36.2	J	44.7	JF	*1.235	13.2	J	13.2	J	ND or <QL	< 0.917	UJ	< 0.917	UJ	ND or <QL	3.84	J	3.84	J	ND or <QL
08A-0004-C1BS	18.4	J	18.4	J	ND or <QL	28.9	J	35.7	JF	*1.235	12	J	12	J	ND or <QL	< 0.415	UJ	< 0.415	UJ	ND or <QL	3.51	J	3.51	J	ND or <QL
08A-0004-C1CS	22.5	J	22.5	J	ND or <QL	48.7	J	60.1	JF	*1.234	12.8	J	12.8	J	ND or <QL	< 0.973	UJ	< 0.973	UJ	ND or <QL	4.82	J	4.82	J	ND or <QL
08A-0004-C1DS	18	J	18	J	ND or <QL	35.6	J	44	JF	*1.236	13.8	J	13.8	J	ND or <QL	0.491	J	0.491	J	ND or <QL	3.5	J	3.5	J	ND or <QL
08A-0004-C1ES	1.6	J	1.6	J	ND or <QL	4.63	J	4.63	J	ND or <QL	1.75	J	1.75	J	ND or <QL	< 0.413	UJ	< 0.413	UJ	ND or <QL	< 0.502	UJ	< 0.502	UJ	ND or <QL
08A-0004-C1FS	1.56	J	1.56	J	ND or <QL	2.3	J	2.3	J	ND or <QL	1.12	J	1.12	J	ND or <QL	< 0.167	UJ	< 0.167	UJ	ND or <QL	0.373	J	0.373	J	ND or <QL
08A-0004-C1FT	24.9	J	36.1	JF	*1.450	45.6	J	56.3	JF	*1.235	15.4	J	15.4	J	ND or <QL	1.21	J	1.21	J	ND or <QL	4.7	J	4.7	J	ND or <QL
08A-0004-C1GS	1.14	J	1.14	J	ND or <QL	1.8	J	1.8	J	ND or <QL	0.907	J	0.907	J	ND or <QL	< 0.165	U	< 0.165	U	ND or <QL	< 0.230	U	< 0.230	U	ND or <QL
08A-0004-C1HS	29.5		42.7	F	*1.447	26.7		33	F	*1.236	15.6	J	15.6	J											

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,6,7,8-HxCDD 57653-85-7 ng/kg					1,2,3,6,7,8-HxCDF 57117-44-9 ng/kg					1,2,3,7,8,9-HxCDD 19408-74-3 ng/kg					1,2,3,7,8,9-HxCDF 72918-21-9 ng/kg					1,2,3,7,8-PeCDD 40321-76-4 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0006-C1ES	2.93	J	2.93	J	ND or <QL	1.58	J	1.58	J	ND or <QL	3.19	J	3.19	J	ND or <QL	< 0.228	U	< 0.228	U	ND or <QL	0.618	J	0.618	J	ND or <QL
08A-0006-C1FS	< 0.120	U	< 0.120	U	ND or <QL	< 0.0961	U	< 0.0961	U	ND or <QL	< 0.101	U	< 0.101	U	ND or <QL	< 0.104	U	< 0.104	U	ND or <QL	< 0.181	U	< 0.181	U	ND or <QL
08A-0006-C1GS	1.86	J	1.86	J	ND or <QL	1.66	J	1.66	J	ND or <QL	0.866	J	0.866	J	ND or <QL	< 0.166	U	< 0.166	U	ND or <QL	< 0.144	U	< 0.144	U	ND or <QL
08A-0006-C1HS	1.04	J	1.04	J	ND or <QL	1.19	J	1.19	J	ND or <QL	< 0.115	U	< 0.115	U	ND or <QL	< 0.124	U	< 0.124	U	ND or <QL	< 0.198	U	< 0.198	U	ND or <QL
08A-0006-C1IS	1.46	J	1.46	J	ND or <QL	1.37	J	1.37	J	ND or <QL	0.93	J	0.93	J	ND or <QL	< 0.154	U	< 0.154	U	ND or <QL	< 0.119	U	< 0.119	U	ND or <QL
08A-0006-C1JS	1.11	J	1.11	J	ND or <QL	0.505	J	0.505	J	ND or <QL	1.36	J	1.36	J	ND or <QL	< 0.150	U	< 0.150	U	ND or <QL	< 0.160	U	< 0.160	U	ND or <QL
08A-0006-C1KS	0.912	J	0.912	J	ND or <QL	0.801	J	0.801	J	ND or <QL	0.582	J	0.582	J	ND or <QL	< 0.112	U	< 0.112	U	ND or <QL	< 0.210	U	< 0.210	U	ND or <QL
08A-0007-C2AS	15	J	15	J	ND or <QL	22.7	J	22.7	J	ND or <QL	10.6	J	10.6	J	ND or <QL	< 0.484	UJ	< 0.484	UJ	ND or <QL	2.74	J	2.74	J	ND or <QL
08A-0007-C2BS	20.9	J	20.9	J	ND or <QL	32.9	J	40.6	JF	*1.234	13.9	J	13.9	J	ND or <QL	< 0.446	UJ	< 0.446	UJ	ND or <QL	4	J	4	J	ND or <QL
08A-0007-C2CS	9.98	J	9.98	J	ND or <QL	18.4	J	18.4	J	ND or <QL	5.31	J	5.31	J	ND or <QL	< 0.194	UJ	< 0.194	UJ	ND or <QL	1.63	J	1.63	J	ND or <QL
08A-0007-C2DS	0.561	J	0.561	J	ND or <QL	1.11	J	1.11	J	ND or <QL	< 0.123	U	< 0.123	U	ND or <QL	< 0.119	U	< 0.119	U	ND or <QL	< 0.148	U	< 0.148	U	ND or <QL
08A-0007-C2ES	< 0.102	U	< 0.102	U	ND or <QL	< 0.0889	U	< 0.0889	U	ND or <QL	< 0.0856	U	< 0.0856	U	ND or <QL	< 0.101	U	< 0.101	U	ND or <QL	< 0.211	U	< 0.211	U	ND or <QL
08A-0007-C2FS	< 0.0970	U	< 0.0970	U	ND or <QL	< 0.0828	U	< 0.0828	U	ND or <QL	< 0.0893	U	< 0.0893	U	ND or <QL	< 0.0837	U	< 0.0837	U	ND or <QL	< 0.154	U	< 0.154	U	ND or <QL
08A-0007-C2GS	0.487	J	0.487	J	ND or <QL	0.291	J	0.291	J	ND or <QL	< 0.0998	U	< 0.0998	U	ND or <QL	< 0.126	U	< 0.126	U	ND or <QL	< 0.149	U	< 0.149	U	ND or <QL
08A-0007-C2HS	0.96	J	0.96	J	ND or <QL	0.888	J	0.888	J	ND or <QL	0.312	J	0.312	J	ND or <QL	< 0.0837	U	< 0.0837	U	ND or <QL	0.311	J	0.311	J	ND or <QL
08A-0007-C2IS	0.355	J	0.355	J	ND or <QL	0.245	J	0.245	J	ND or <QL	< 0.147	U	< 0.147	U	ND or <QL	< 0.102	U	< 0.102	U	ND or <QL	< 0.200	U	< 0.200	U	ND or <QL
08A-0007-C2JS	0.267	J	0.267	J	ND or <QL	< 0.0575	U	< 0.0575	U	ND or <QL	< 0.0651	U	< 0.0651	U	ND or <QL	< 0.0583	U	< 0.0583	U	ND or <QL	< 0.137	U	< 0.137	U	ND or <QL
08A-0007-C2KS	< 0.0873	U	< 0.0873	U	ND or <QL	0.253	J	0.253	J	ND or <QL	< 0.0805	U	< 0.0805	U	ND or <QL	< 0.0654	U	< 0.0654	U	ND or <QL	< 0.158	U	< 0.158	U	ND or <QL
08A-0007-C2LS	< 0.194	U	< 0.194	U	ND or <QL	< 0.0599	U	< 0.0599	U	ND or <QL	< 0.145	U	< 0.145	U	ND or <QL	< 0.0767	UJ	< 0.0767	UJ	ND or <QL	< 0.110	U	< 0.110	U	ND or <QL
08A-0008-C1AS	17.3	J	17.3	J	ND or <QL	24.3	J	24.3	J	ND or <QL	12.8	J	12.8	J	ND or <QL	< 0.481	UJ	< 0.481	UJ	ND or <QL	3.27	J	3.27	J	ND or <QL
08A-0008-C1BS	19.6	J	19.6	J	ND or <QL	23.8	J	23.8	J	ND or <QL	12.1	J	12.1	J	ND or <QL	< 0.679	UJ	< 0.679	UJ	ND or <QL	3.57	J	3.57	J	ND or <QL
08A-0008-C1CS	21.4	J	21.4	J	ND or <QL	30.8	J	30.8	J	ND or <QL	13.5	J	13.5	J	ND or <QL	< 0.773	UJ	< 0.773	UJ	ND or <QL	3.92	J	3.92	J	ND or <QL
08A-0008-C1DS	22.7	J	22.7	J	ND or <QL	35.5	J	43.8	JF	*1.234	16.3	J	16.3	J	ND or <QL	< 0.752	UJ	< 0.752	UJ	ND or <QL	4.15	J	4.15	J	ND or <QL
08A-0008-C1ES	27.1	J	39.3	JF	*1.450	39.3	J	48.5	JF	*1.234	21.9	J	21.9	J	ND or <QL	< 1.32	UJ	< 1.32	UJ	ND or <QL	4.92	J	4.92	J	ND or <QL
08A-0008-C1ET	24.8	J	35.9	JF	*1.448	38.1	J	47.1	JF	*1.236	17.4	J	17.4	J	ND or <QL	< 0.542	UJ	< 0.542	UJ	ND or <QL	4.78	J	4.78	J	ND or <QL
08A-0008-C1FS	26.7	J	26.7	J	ND or <QL	42.9	J	53	JF	*1.235	17.7	J	17.7	J	ND or <QL	< 0.512	UJ	< 0.512	UJ	ND or <QL	4.64	J	4.64	J	ND or <QL
08A-0008-C1GS	24.9	J	24.9	J	ND or <QL	43.2		53.4	F	*1.236	18	J	18	J	ND or <QL	0.734	J	0.734	J	ND or <QL	4.88	J	4.88	J	ND or <QL
08A-0008-C1HS	31.3		45.4	F	*1.450	40.4		49.9	F	*1.235	19	J	19	J	ND or <QL	< 1.37	U	< 1.37	U	ND or <QL	5.49	J	5.49	J	ND or <QL
08A-0008-C1IS	46.8	J	67.8	JF	*1.449	46.5	J	57.4	JF	*1.234	28.2	J	28.2	J	ND or <QL	1.07	J	1.07	J	ND or <QL	8.32	J	8.32	J	ND or <QL
08A-0008-C1JS	147		213	F	*1.449	85.3		105	F	*1.231	81.4		113	F	*1.388	3.11	J	3.11	J	ND or <QL	24.4	J	24.4	J	ND or <QL
08A-0008-C1KS	18.7	J	18.7	J	ND or <QL	95.1		117	F	*1.230	12.8	J	12.8	J	ND or <QL	< 0.554	U	< 0.554	U	ND or <QL	5.87	J	5.87	J	ND or <QL
08A-0009-C3AS	25.4	J	25.4	J	ND or <QL	25.7	J	25.7	J	ND or <QL	19.3	J	19.3	J	ND or <QL	0.468	J	0.468	J	ND or <QL	4.64	J	4.64	J	ND or <QL
08A-0009-C3BS	6.97	J	6.97	J	ND or <QL	5.89	J	5.89	J	ND or <QL	< 5.47	UJ	< 5.47	UJ	ND or <QL	< 0.374	UJ	< 0.374	UJ	ND or <QL	1.53	J	1.53	J	ND or <QL
08A-0009-C3CS	29.5	J	29.5	J	ND or <QL	44.3	J	54.7	JF	*1.235	21.4	J	21.4	J	ND or <QL	< 1.76	UJ	< 1.76	UJ	ND or <QL	6.31	J	6.31	J	ND or <QL
08A-0009-C3DS	30.8	J	30.8	J	ND or <QL	44.6	J	55.1	JF	*1.235	21.1	J	21.1	J											

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,6,7,8-HxCDD 57653-85-7 ng/kg					1,2,3,6,7,8-HxCDF 57117-44-9 ng/kg					1,2,3,7,8,9-HxCDD 19408-74-3 ng/kg					1,2,3,7,8,9-HxCDF 72918-21-9 ng/kg					1,2,3,7,8-PeCDD 40321-76-4 ng/kg				
	Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted		
	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]
08A-0010-C2MS	19.7	J	19.7	J	ND or <QL	9.87	J	9.87	J	ND or <QL	9.91	J	9.91	J	ND or <QL	0.861	J	0.861	J	ND or <QL	2.96	J	2.96	J	ND or <QL
08A-0011-C1AS	21.2	J	30.7	JF	*1.448	37.1	J	45.8	JF	*1.235	12	J	12	J	ND or <QL	0.414	J	0.414	J	ND or <QL	4.36	J	4.36	J	ND or <QL
08A-0011-C1BS	0.86	J	0.86	J	ND or <QL	2	J	2	J	ND or <QL	< 0.256	U	< 0.256	U	ND or <QL	< 0.167	U	< 0.167	U	ND or <QL	< 0.228	U	< 0.228	U	ND or <QL
08A-0011-C1CS	< 0.233	U	< 0.233	U	ND or <QL	< 0.137	U	< 0.137	U	ND or <QL	< 0.200	U	< 0.200	U	ND or <QL	< 0.148	U	< 0.148	U	ND or <QL	< 0.195	U	< 0.195	U	ND or <QL
08A-0011-C1DS	< 0.127	U	< 0.127	U	ND or <QL	< 0.0978	U	< 0.0978	U	ND or <QL	< 0.107	U	< 0.107	U	ND or <QL	< 0.106	U	< 0.106	U	ND or <QL	< 0.168	U	< 0.168	U	ND or <QL
08A-0011-C1ES	< 0.227	U	< 0.227	U	ND or <QL	< 0.166	U	< 0.166	U	ND or <QL	< 0.192	U	< 0.192	U	ND or <QL	< 0.181	U	< 0.181	U	ND or <QL	< 0.172	U	< 0.172	U	ND or <QL
08A-0011-C1ET	< 0.255	U	< 0.255	U	ND or <QL	< 0.144	U	< 0.144	U	ND or <QL	< 0.220	U	< 0.220	U	ND or <QL	< 0.168	U	< 0.168	U	ND or <QL	< 0.283	U	< 0.283	U	ND or <QL
08A-0011-C1FS	2.08	J	2.08	J	ND or <QL	< 0.186	U	< 0.186	U	ND or <QL	< 0.203	U	< 0.203	U	ND or <QL	< 0.185	U	< 0.185	U	ND or <QL	< 0.248	U	< 0.248	U	ND or <QL
08A-0011-C1GS	< 0.486	U	< 0.486	U	ND or <QL	< 0.0947	U	< 0.0947	U	ND or <QL	< 0.285	U	< 0.285	U	ND or <QL	< 0.108	U	< 0.108	U	ND or <QL	< 0.169	U	< 0.169	U	ND or <QL
08A-0011-C1HS	< 0.520	U	< 0.520	U	ND or <QL	< 0.101	U	< 0.101	U	ND or <QL	1.6	J	1.6	J	ND or <QL	< 0.117	U	< 0.117	U	ND or <QL	< 0.130	U	< 0.130	U	ND or <QL
08A-0011-C1IS	1.04	J	1.04	J	ND or <QL	< 0.167	U	< 0.167	U	ND or <QL	2.01	J	2.01	J	ND or <QL	< 0.209	U	< 0.209	U	ND or <QL	< 0.247	U	< 0.247	U	ND or <QL
08A-0011-C1JS	0.6	J	0.6	J	ND or <QL	< 0.103	U	< 0.103	U	ND or <QL	0.955	J	0.955	J	ND or <QL	< 0.124	U	< 0.124	U	ND or <QL	< 0.205	U	< 0.205	U	ND or <QL
08A-0011-C1KS	< 0.375	U	< 0.375	U	ND or <QL	< 0.185	U	< 0.185	U	ND or <QL	1.47	J	1.47	J	ND or <QL	< 0.228	U	< 0.228	U	ND or <QL	< 0.227	U	< 0.227	U	ND or <QL
08A-0011-C1LS	0.471	J	0.471	J	ND or <QL	< 0.131	U	< 0.131	U	ND or <QL	0.906	J	0.906	J	ND or <QL	< 0.147	U	< 0.147	U	ND or <QL	< 0.209	U	< 0.209	U	ND or <QL
08A-0011-C1MS	0.725	J	0.725	J	ND or <QL	< 0.0805	U	< 0.0805	U	ND or <QL	1.01	J	1.01	J	ND or <QL	< 0.0935	U	< 0.0935	U	ND or <QL	< 0.199	U	< 0.199	U	ND or <QL
08A-0012-C1AS	17.1	J	17.1	J	ND or <QL	24.9	J	24.9	J	ND or <QL	10.3	J	10.3	J	ND or <QL	< 0.698	UJ	< 0.698	UJ	ND or <QL	2.98	J	2.98	J	ND or <QL
08A-0012-C1BS	19.3	J	19.3	J	ND or <QL	14.7	J	14.7	J	ND or <QL	7.96	J	7.96	J	ND or <QL	< 0.510	UJ	< 0.510	UJ	ND or <QL	2.57	J	2.57	J	ND or <QL
08A-0012-C1CS	4.78	J	4.78	J	ND or <QL	8.03	J	8.03	J	ND or <QL	3.58	J	3.58	J	ND or <QL	< 0.719	UJ	< 0.719	UJ	ND or <QL	0.927	J	0.927	J	ND or <QL
08A-0012-C1DS	30	J	30	J	ND or <QL	45.3	J	55.9	JF	*1.234	21.2	J	21.2	J	ND or <QL	0.74	J	0.74	J	ND or <QL	5.78	J	5.78	J	ND or <QL
08A-0012-C1ES	22.9	J	22.9	J	ND or <QL	45.4	J	56.1	JF	*1.236	15.2	J	15.2	J	ND or <QL	< 0.898	UJ	< 0.898	UJ	ND or <QL	4.42	J	4.42	J	ND or <QL
08A-0012-C1FS	14.9	J	14.9	J	ND or <QL	16.7	J	16.7	J	ND or <QL	7.75	J	7.75	J	ND or <QL	< 0.253	UJ	< 0.253	UJ	ND or <QL	2.09	J	2.09	J	ND or <QL
08A-0012-C1FT	26.6	J	26.6	J	ND or <QL	33.4	J	41.2	JF	*1.234	15	J	15	J	ND or <QL	< 0.635	UJ	< 0.635	UJ	ND or <QL	4.12	J	4.12	J	ND or <QL
08A-0012-C1GS	38.4	J	55.6	JF	*1.448	60.8	J	75.1	JF	*1.235	21.3	J	21.3	J	ND or <QL	< 0.952	UJ	< 0.952	UJ	ND or <QL	6.63	J	6.63	J	ND or <QL
08A-0012-C1HS	5.54	J	5.54	J	ND or <QL	7.9	J	7.9	J	ND or <QL	4	J	4	J	ND or <QL	< 0.209	UJ	< 0.209	UJ	ND or <QL	< 0.987	UJ	< 0.987	UJ	ND or <QL
08A-0012-C1IS	53.7		77.8	F	*1.449	56		69.2	F	*1.236	19.8		27.5	F	*1.389	< 1.17	U	< 1.17	U	ND or <QL	8.52	J	8.52	J	ND or <QL
08A-0012-C1JS	26	J	26	J	ND or <QL	22.8	J	22.8	J	ND or <QL	13.5	J	13.5	J	ND or <QL	< 0.627	UJ	< 0.627	UJ	ND or <QL	4.25	J	4.25	J	ND or <QL
08A-0013-C2AS	20.2	J	20.2	J	ND or <QL	21.7	J	21.7	J	ND or <QL	13.4	J	13.4	J	ND or <QL	< 0.554	UJ	< 0.554	UJ	ND or <QL	4.8	J	4.8	J	ND or <QL
08A-0013-C2BS	25.2	J	36.5	JF	*1.448	48.2	J	59.5	JF	*1.234	18.3	J	18.3	J	ND or <QL	< 0.852	UJ	< 0.852	UJ	ND or <QL	4.96	J	4.96	J	ND or <QL
08A-0013-C2CS	27.5	J	27.5	J	ND or <QL	29.2	J	29.2	J	ND or <QL	17.6	J	17.6	J	ND or <QL	< 0.356	UJ	< 0.356	UJ	ND or <QL	5.42	J	5.42	J	ND or <QL
08A-0013-C2DS	28.4	J	28.4	J	ND or <QL	33.6	J	33.6	J	ND or <QL	21.8	J	21.8	J	ND or <QL	< 0.583	UJ	< 0.583	UJ	ND or <QL	5.55	J	5.55	J	ND or <QL
08A-0013-C2ES	27	J	27	J	ND or <QL	39.8	J	49.2	JF	*1.236	19.4	J	19.4	J	ND or <QL	1.06	J	1.06	J	ND or <QL	5.6	J	5.6	J	ND or <QL
08A-0013-C2FS	33.1	J	48	JF	*1.450	66.1	J	81.6	JF	*1.234	20	J	20	J	ND or <QL	1.16	J	1.16	J	ND or <QL	6.8	J	6.8	J	ND or <QL
08A-0013-C2FT	33.7	J	33.7	J	ND or <QL	60.9	J	75.2	JF	*1.235	21.1	J	21.1	J	ND or <QL	1.11	J	1.11	J	ND or <QL	6.79	J	6.79	J	ND or <QL
08A-0013-C2GS	31		44.9	F	*1.448	42.9		53	F	*1.235	19.2	J	19.2	J	ND or <QL	0.943	J	0.943	J	ND or <QL	5.85	J	5.85	J	ND or <QL
08A-0013-C2GT	31.7		45.9	F	*1.448	45.1		55.7	F	*1.235	19.1	J	19.1	J	ND or <QL	< 0.544	U	< 0.544	U	ND or <QL	5.01				

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,6,7,8-HxCDD 57653-85-7 ng/kg					1,2,3,6,7,8-HxCDF 57117-44-9 ng/kg					1,2,3,7,8,9-HxCDD 19408-74-3 ng/kg					1,2,3,7,8,9-HxCDF 72918-21-9 ng/kg					1,2,3,7,8-PeCDD 40321-76-4 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual			
08A-0015-C2AS	17.5	J	17.5	J	ND or <QL	24.7	J	24.7	J	ND or <QL	12.2	J	12.2	J	ND or <QL	< 0.354	UJ	< 0.354	UJ	ND or <QL	3.25	J	3.25	J	ND or <QL
08A-0015-C2BS	14.1	J	14.1	J	ND or <QL	16.7	J	16.7	J	ND or <QL	8.7	J	8.7	J	ND or <QL	< 0.387	UJ	< 0.387	UJ	ND or <QL	2.8	J	2.8	J	ND or <QL
08A-0015-C2CS	33	J	47.8	JF	ND or <QL	35.6	J	44	JF	*1.236	19.1	J	19.1	J	ND or <QL	< 0.953	UJ	< 0.953	UJ	ND or <QL	6.14	J	6.14	J	ND or <QL
08A-0015-C2DS	41.4	J	60	JF	*1.449	48.6	J	60	JF	*1.235	26.7	J	26.7	J	ND or <QL	< 0.813	UJ	< 0.813	UJ	ND or <QL	6.6	J	6.6	J	ND or <QL
08A-0015-C2ES	19.2	J	19.2	J	ND or <QL	27.3		33.7	F	*1.234	11.7	J	11.7	J	ND or <QL	< 0.436	UJ	< 0.436	UJ	ND or <QL	3.45	J	3.45	J	ND or <QL
08A-0015-C2FS	40		58	F	*1.450	38.9		48	F	*1.234	22.6	J	22.6	J	ND or <QL	< 1.24	U	< 1.24	U	ND or <QL	6.83	J	6.83	J	ND or <QL
08A-0015-C2GS	3.03	J	3.03	J	ND or <QL	3.8	J	3.8	J	ND or <QL	2.29	J	2.29	J	ND or <QL	< 0.130	U	< 0.130	U	ND or <QL	1.11	J	1.11	J	ND or <QL
08A-0015-C2HS	< 0.265	U	< 0.265	U	ND or <QL	< 0.0909	U	< 0.0909	U	ND or <QL	< 0.138	U	< 0.138	U	ND or <QL	< 0.109	U	< 0.109	U	ND or <QL	< 0.111	U	< 0.111	U	ND or <QL
08A-0015-C2IS	< 0.298	U	< 0.298	U	ND or <QL	< 0.213	U	< 0.213	U	ND or <QL	< 0.255	U	< 0.255	U	ND or <QL	< 0.232	U	< 0.232	U	ND or <QL	< 0.283	U	< 0.283	U	ND or <QL
08A-0015-C2JS	< 0.231	U	< 0.231	U	ND or <QL	< 0.135	U	< 0.135	U	ND or <QL	< 0.194	U	< 0.194	U	ND or <QL	< 0.144	U	< 0.144	U	ND or <QL	< 0.213	U	< 0.213	U	ND or <QL
08A-0016-C1AS	12.7	J	12.7	J	ND or <QL	13.2	J	13.2	J	ND or <QL	9.6	J	9.6	J	ND or <QL	< 0.516	UJ	< 0.516	UJ	ND or <QL	2.27	J	2.27	J	ND or <QL
08A-0016-C1BS	33.4	J	33.4	J	ND or <QL	33.2	J	33.2	J	ND or <QL	24.4	J	24.4	J	ND or <QL	0.59	J	0.59	J	ND or <QL	6.84	J	6.84	J	ND or <QL
08A-0016-C1CS	26.6	J	38.5	JF	*1.447	27.7	J	34.2	JF	*1.235	19	J	19	J	ND or <QL	0.593	J	0.593	J	ND or <QL	5.1	J	5.1	J	ND or <QL
08A-0016-C1DS	32.7	J	32.7	J	ND or <QL	31	J	31	J	ND or <QL	22.8	J	22.8	J	ND or <QL	< 0.618	UJ	< 0.618	UJ	ND or <QL	6.84	J	6.84	J	ND or <QL
08A-0016-C1ES	35.9	J	52	JF	*1.448	40.4	J	49.9	JF	*1.235	24.7	J	24.7	J	ND or <QL	0.824	J	0.824	J	ND or <QL	7.08	J	7.08	J	ND or <QL
08A-0016-C1ET	29.4	J	29.4	J	ND or <QL	36.6	J	36.6	J	ND or <QL	21.4	J	21.4	J	ND or <QL	1.19	J	1.19	J	ND or <QL	6.32	J	6.32	J	ND or <QL
08A-0016-C1FS	32.4	J	32.4	J	ND or <QL	40.1	J	49.5	JF	*1.234	21.6	J	21.6	J	ND or <QL	< 0.640	UJ	< 0.640	UJ	ND or <QL	6.35	J	6.35	J	ND or <QL
08A-0016-C1GS	37.7	J	54.6	JF	*1.448	63.5	J	78.4	JF	*1.235	23.9	J	23.9	J	ND or <QL	< 1.08	UJ	< 1.08	UJ	ND or <QL	8.64	J	8.64	J	ND or <QL
08A-0016-C1HS	6.54	J	6.54	J	ND or <QL	11.5	J	11.5	J	ND or <QL	3.21	J	3.21	J	ND or <QL	< 0.257	UJ	< 0.257	UJ	ND or <QL	1.39	J	1.39	J	ND or <QL
08A-0016-C1IS	44.2	J	64	JF	*1.448	74.6	J	92.1	JF	*1.235	25.7	J	25.7	J	ND or <QL	1.04	J	1.04	J	ND or <QL	7.54	J	7.54	J	ND or <QL
08A-0016-C1JS	80.8	J	117	JF	*1.448	49.2	J	60.8	JF	*1.236	41.3	J	57.4	JF	*1.390	1.14	J	1.14	J	ND or <QL	12.5	J	12.5	J	ND or <QL
08A-0016-C1KS	104	J	151	JF	*1.452	67.6	J	83.5	JF	*1.235	49.8	J	69.2	JF	*1.390	1.98	J	1.98	J	ND or <QL	14.6	J	14.6	J	ND or <QL
08A-0016-C1LS	123	J	178	JF	*1.447	73.2	J	90.4	JF	*1.235	58.1	J	80.7	JF	*1.389	2.25	J	2.25	J	ND or <QL	21.4	J	21.4	J	ND or <QL
08A-0017-C1AS	25.6	J	25.6	J	ND or <QL	39.6	J	48.9	JF	*1.235	18.8	J	18.8	J	ND or <QL	< 1.05	UJ	< 1.05	UJ	ND or <QL	5.71	J	5.71	J	ND or <QL
08A-0017-C1AT	26.4	J	26.4	J	ND or <QL	41.4	J	51.1	JF	*1.234	18.7	J	18.7	J	ND or <QL	< 0.849	UJ	< 0.849	UJ	ND or <QL	6.12	J	6.12	J	ND or <QL
08A-0017-C1BS	32.7	J	38.2		Split-Replaced	59.7	J	62.2	B	Split-Replaced	21.4	J	27.3	B	Split-Replaced	0.729	J	1.81	J	Split-Replaced	6.78	J	9.87	J	Split-Replaced
08A-0017-C1CS	47.3	J	68.5	JF	*1.448	98.3	J	121	JF	*1.231	26.6	J	26.6	J	ND or <QL	7.66	J	7.66	J	ND or <QL	8.45	J	8.45	J	ND or <QL
08A-0017-C1DS	35.3	J	40.3		Split-Replaced	82.1	J	82.6	B	Split-Replaced	20.8	J	32.7	B	Split-Replaced	< 0.745	UJ	2.36	J	Split-Replaced	6.16	J	9.99	EZ	Split-Replaced
08A-0017-C1ES	39.4	J	57.1	JF	*1.449	93.1	J	115	JF	*1.235	23.9	J	23.9	J	ND or <QL	0.787	J	0.787	J	ND or <QL	8.78	J	8.78	J	ND or <QL
08A-0017-C1FS	53.1	J	76.9	JF	*1.448	138	J	170	JF	*1.232	30.5	J	30.5	J	ND or <QL	1.5	J	1.5	J	ND or <QL	11	J	11	J	ND or <QL
08A-0017-C1GS	44.6	J	64.6	JF	*1.448	103	J	127	JF	*1.233	25.3	J	25.3	J	ND or <QL	1.68	J	1.68	J	ND or <QL	8.96	J	8.96	J	ND or <QL
08A-0017-C1HS	101	J	146	JF	*1.446	167	J	206	JF	*1.234	51	J	70.8	JF	*1.388	2.68	J	2.68	J	ND or <QL	20.7	J	20.7	J	ND or <QL
08A-0017-C1IS	126	J	183	JF	*1.452	187	J	231	JF	*1.235	58.6	J	81.4	JF	*1.389	2.62	J	2.62	J	ND or <QL	34.7	J	34.7	J	None
08A-0017-C1JS	80.4	J	116	JF	*1.443	114	J	141	JF	*1.237	40.6	J	56.4	JF	*1.389	3	J	3	J	ND or <QL	19	J	19	J	ND or <QL
08A-0017-C1KS	2.53	J	2.53	J	ND or <QL	4.07	J	4.07	J	ND or <QL	2.74	J	2.74	J	ND or <QL	< 0.466	U	< 0.466	U	ND or <QL	1.2	J	1.2	J	ND or <QL
08A-0017-C1LS	1.54	J	1.54	J	ND or <QL	< 0.199	U	< 0.199	U	ND or <QL	< 0.259	U	< 0.259	U	ND or <QL	< 0.201	U	< 0.201	U	ND or <QL	< 0.273	U	< 0.273	U	ND or <QL
08A-00																									

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,6,7,8-HxCDD 57653-85-7 ng/kg					1,2,3,6,7,8-HxCDF 57117-44-9 ng/kg					1,2,3,7,8,9-HxCDD 19408-74-3 ng/kg					1,2,3,7,8,9-HxCDF 72918-21-9 ng/kg					1,2,3,7,8-PeCDD 40321-76-4 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0019-D1AS	26.7	J	26.7	J	ND or <QL	28.5	J	28.5	J	ND or <QL	14.3	J	14.3	J	ND or <QL	< 1.02	UJ	< 1.02	UJ	ND or <QL	4.95	J	4.95	J	ND or <QL
08A-0019-D1BS	15.3	J	15.3	J	ND or <QL	18.6	J	18.6	J	ND or <QL	7.24	J	7.24	J	ND or <QL	< 0.492	UJ	< 0.492	UJ	ND or <QL	3.06	J	3.06	J	ND or <QL
08A-0019-D1CS	17	J	17	J	ND or <QL	28.7	J	28.7	J	ND or <QL	7.63	J	7.63	J	ND or <QL	< 0.979	UJ	< 0.979	UJ	ND or <QL	< 3.07	UJ	< 3.07	UJ	ND or <QL
08A-0019-D1DS	28.6	J	28.6	J	ND or <QL	34.5	J	42.6	JF	*1.235	19.1	J	19.1	J	ND or <QL	< 0.534	UJ	< 0.534	UJ	ND or <QL	4.65	J	4.65	J	ND or <QL
08A-0019-D1ES	69.6	J	101	JF	*1.451	55.8	J	68.9	JF	*1.235	32	J	44.4	JF	*1.388	< 1.52	UJ	< 1.52	UJ	ND or <QL	9.65	J	9.65	J	ND or <QL
08A-0020-C2AS	21	J	21	J	ND or <QL	25.4	J	25.4	J	ND or <QL	13	J	13	J	ND or <QL	< 0.903	UJ	< 0.903	UJ	ND or <QL	4.29	J	4.29	J	ND or <QL
08A-0020-C2BS	32	J	32	J	ND or <QL	50.8	J	62.7	JF	*1.234	18.6	J	18.6	J	ND or <QL	0.6	J	0.6	J	ND or <QL	5.54	J	5.54	J	ND or <QL
08A-0020-C2BT	9.93	J	9.93	J	ND or <QL	18.4	J	18.4	J	ND or <QL	6.06	J	6.06	J	ND or <QL	< 0.860	UJ	< 0.860	UJ	ND or <QL	1.96	J	1.96	J	ND or <QL
08A-0020-C2CS	57.3	J	88		Split-Replaced	62.2	J	104	B	Split-Replaced	26.6	J	53.4	B	Split-Replaced	1.33	J	8.54	J	Split-Replaced	5.73	J	15.8		Split-Replaced
08A-0020-C2DS	55.6	J	191		Split-Replaced	39.4	J	140	B	Split-Replaced	26.7	J	115	B	Split-Replaced	3.58	J	13.3		Split-Replaced	11.6	J	50.6		Split-Replaced
08A-0020-C2ES	91.9	J	223		Split-Replaced	106	J	273	B	Split-Replaced	39.4	J	122	B	Split-Replaced	2.02	J	9.33	J	Split-Replaced	16.2	J	47.2		Split-Replaced
08A-0020-C2FS	25.4	J	25.4	J	ND or <QL	73.7	J	91	JF	*1.235	11.6	J	11.6	J	ND or <QL	0.797	J	0.797	J	ND or <QL	6.96	J	6.96	J	ND or <QL
08A-0020-C2FT	74.4	J	108	JF	*1.452	231	J	285	JF	*1.234	36.1	J	50.1	JF	*1.388	< 1.53	UJ	< 1.53	UJ	ND or <QL	24.5	J	24.5	J	ND or <QL
08A-0020-C2GS	3.6	J	3.6	J	ND or <QL	12.3	J	12.3	J	ND or <QL	2.83	J	2.83	J	ND or <QL	0.675	J	0.675	J	ND or <QL	1.54	J	1.54	J	ND or <QL
08A-0020-C2HS	1.5	J	1.5	J	ND or <QL	< 1.29	U	< 1.29	U	ND or <QL	1.11	J	1.11	J	ND or <QL	0.354	J	0.354	J	ND or <QL	0.37	J	0.37	J	ND or <QL
08A-0021-C1AS	23.1	J	23.1	J	ND or <QL	39.5	J	39.5	J	ND or <QL	15	J	15	J	ND or <QL	< 1.51	UJ	< 1.51	UJ	ND or <QL	5.19	J	5.19	J	ND or <QL
08A-0021-C1BS	54.4		78.8	F	*1.449	44.6		55.1	F	*1.235	24.4		33.9	F	*1.389	3.69	J	3.69	J	ND or <QL	5.07	J	5.07	J	ND or <QL
08A-0021-C1CS	36.6		53	F	*1.448	49.9		61.6	F	*1.234	19.3	J	19.3	J	ND or <QL	1.31	J	1.31	J	ND or <QL	6.03	J	6.03	J	ND or <QL
08A-0021-C1DS	100	J	145	JF	*1.450	67.2	J	83	JF	*1.235	43.5	J	60.4	JF	*1.389	1.92	J	1.92	J	ND or <QL	16.5	J	16.5	J	ND or <QL
08A-0021-C1ES	168	J	243	JF	*1.446	273	J	337	JF	*1.234	68.1	J	94.6	JF	*1.389	5.39	J	5.39	J	ND or <QL	59.9	J	59.9	J	None
08A-0021-C1FS	152	J	220	JF	*1.447	688	J	850	JF	*1.235	71.7	J	99.6	JF	*1.389	< 2.66	UJ	< 2.66	UJ	ND or <QL	78.6	J	78.6	J	None
08A-0021-C1FT	139	J	201	JF	*1.446	679	J	839	JF	*1.236	68.8	J	95.6	JF	*1.390	5.08	J	5.08	J	ND or <QL	77.6	J	77.6	J	None
08A-0021-C1GS	775	J	1120	JF	*1.445	403	J	498	JF	*1.236	532	J	739	JF	*1.389	12.7	J	12.7	J	ND or <QL	224	J	224	J	None
08A-0021-C1HS	33.6		48.7	F	*1.449	64.1		79.2	F	*1.236	13.5	J	13.5	J	ND or <QL	1.81	J	1.81	J	ND or <QL	5.72	J	5.72	J	ND or <QL
08A-0022-C1AS	33.2	J	33.2	J	ND or <QL	42.9	J	53	JF	*1.235	20	J	20	J	ND or <QL	< 0.832	UJ	< 0.832	UJ	ND or <QL	6.72	J	6.72	J	ND or <QL
08A-0022-C1BS	47.5	J	68.8	JF	*1.448	119	J	147	JF	*1.235	28.5	J	28.5	J	ND or <QL	1.75	J	1.75	J	ND or <QL	9.14	J	9.14	J	ND or <QL
08A-0022-C1CS	342	J	496	JF	*1.450	127	J	157	JF	*1.236	160	J	222	JF	*1.388	3.9	J	3.9	J	ND or <QL	85.2	J	85.2	J	None
08A-0022-C1DS	73.5		107	F	*1.456	158		195	F	*1.234	29.8		41.4	F	*1.389	3.47	J	3.47	J	ND or <QL	20.1	J	20.1	J	ND or <QL
08A-0022-C1ES	1.81	J	1.81	J	ND or <QL	1.59	J	1.59	J	ND or <QL	1.76	J	1.76	J	ND or <QL	< 0.185	U	< 0.185	U	ND or <QL	0.541	J	0.541	J	ND or <QL
08A-0022-C1FS	< 0.335	U	< 0.335	U	ND or <QL	< 0.182	U	< 0.182	U	ND or <QL	1.89	J	1.89	J	ND or <QL	< 0.198	U	< 0.198	U	ND or <QL	0.235	J	0.235	J	ND or <QL
08A-0022-C1GS	1.5	J	1.5	J	ND or <QL	< 0.129	U	< 0.129	U	ND or <QL	2.32	J	2.32	J	ND or <QL	< 0.146	U	< 0.146	U	ND or <QL	< 0.177	U	< 0.177	U	ND or <QL
08A-0022-C1HS	3.85	J	3.85	J	ND or <QL	2.52	J	2.52	J	ND or <QL	4.23	J	4.23	J	ND or <QL	1.62	J	1.62	J	ND or <QL	1.85	J	1.85	J	ND or <QL
08A-0022-C1IS	2.11	J	2.11	J	ND or <QL	< 0.271	U	< 0.271	U	ND or <QL	2.73	J	2.73	J	ND or <QL	0.291	J	0.291	J	ND or <QL	0.323	J	0.323	J	ND or <QL
08A-0022-C1JS	< 0.103	U	< 0.103	U	ND or <QL	< 0.0873	U	< 0.0873	U	ND or <QL	< 0.0808	U	< 0.0808	U	ND or <QL	< 0.105	U	< 0.105	U	ND or <QL	< 0.104	U	< 0.104	U	ND or <QL
08A-0022-D2AS	34.8	J	50.4	JF	*1.448	39.2	J	48.4	JF	*1.235	21.9	J	21.9	J	ND or <QL	0.782	J	0.782	J	ND or <QL	6.2	J	6.2	J	ND or <QL
08A-0022-D2BS	13.7	J	13.7	J	ND or <QL	19.2	J	19.2	J	ND or <QL	7.77	J	7.77	J	ND or <QL	1.09	J	1.09	J	ND or <QL	2.63	J	2.63	J	ND or <QL
08A-0022-D2CS	19.4	J	19.4	J	ND or <QL	27.8	J	27.8	J	ND or <QL	14.9	J	14.9	J	ND or <QL	0.398	J	0.398	J	ND or <QL	3.79	J	3.79	J	ND or <QL
08A-0022-D2DS	46.5	J	67.4	JF	*1.449	122	J</																		

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method	1,2,3,6,7,8-HxCDD 57653-85-7 ng/kg					1,2,3,6,7,8-HxCDF 57117-44-9 ng/kg					1,2,3,7,8,9-HxCDD 19408-74-3 ng/kg					1,2,3,7,8,9-HxCDF 72918-21-9 ng/kg					1,2,3,7,8-PeCDD 40321-76-4 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0024-C1ES	87.3	J	126	JF	*1.443	300	J	371	JF	*1.237	52.4	J	72.8	JF	*1.389	< 1.40	UJ	< 1.40	UJ	ND or <QL	56.8	J	56.8	J	None
08A-0024-C1FS	116	J	168	JF	*1.448	317	J	391	JF	*1.233	42.3	J	58.8	JF	*1.390	2.89	J	2.89	J	ND or <QL	35.6	J	35.6	J	None
08A-0024-C1FT	142	J	206	JF	*1.451	326	J	403	JF	*1.236	55.8	J	77.5	JF	*1.389	4.75	J	4.75	J	ND or <QL	52.3	J	52.3	J	None
08A-0024-C1GS	11.4	J	11.4	J	ND or <QL	28.3		35	F	*1.237	4.47	J	4.47	J	ND or <QL	0.773	J	0.773	J	ND or <QL	2.54	J	2.54	J	ND or <QL
08A-0024-C1HS	1.69	J	1.69	J	ND or <QL	3.59	J	3.59	J	ND or <QL	0.901	J	0.901	J	ND or <QL	< 0.175	U	< 0.175	U	ND or <QL	< 0.221	U	< 0.221	U	ND or <QL
08A-0025-C1AS	4.5	J	4.5	J	ND or <QL	3.8	J	3.8	J	ND or <QL	2.85	J	2.85	J	ND or <QL	< 0.629	UJ	< 0.629	UJ	ND or <QL	0.845	J	0.845	J	ND or <QL
08A-0025-C1BS	7.1	J	7.1	J	ND or <QL	7.28	J	7.28	J	ND or <QL	3.91	J	3.91	J	ND or <QL	< 0.593	UJ	< 0.593	UJ	ND or <QL	1.38	J	1.38	J	ND or <QL
08A-0025-C1CS	14.4	J	14.4	J	ND or <QL	13.5	J	13.5	J	ND or <QL	6.78	J	6.78	J	ND or <QL	< 1.57	UJ	< 1.57	UJ	ND or <QL	2.52	J	2.52	J	ND or <QL
08A-0025-C1DS	26.6	J	26.6	J	ND or <QL	17.5	J	17.5	J	ND or <QL	12.1	J	12.1	J	ND or <QL	0.387	J	0.387	J	ND or <QL	5.13	J	5.13	J	ND or <QL
08A-0025-C1ES	154	J	223	JF	*1.448	98.4	J	122	JF	*1.240	74.4	J	103	JF	*1.384	2.28	J	2.28	J	ND or <QL	29.2	J	29.2	J	None
08A-0025-C1ET	173	J	251	JF	*1.451	103	J	127	JF	*1.233	54.4	J	75.6	JF	*1.390	< 1.34	UJ	< 1.34	UJ	ND or <QL	27.4	J	27.4	J	ND or <QL
08A-0025-C1FS	139	J	201	JF	*1.446	253	J	312	JF	*1.233	73.7	J	102	JF	*1.384	2.62	J	2.62	J	ND or <QL	64.9	J	64.9	J	None
08A-0025-C1GS	5.72	J	5.72	J	ND or <QL	18.3	J	18.3	J	ND or <QL	3.47	J	3.47	J	ND or <QL	0.94	J	0.94	J	ND or <QL	1.95	J	1.95	J	ND or <QL
08A-0026-C1AS	26.1	J	26.1	J	ND or <QL	35.6	J	35.6	J	ND or <QL	14.3	J	14.3	J	ND or <QL	0.752	J	0.752	J	ND or <QL	4.9	J	4.9	J	ND or <QL
08A-0026-C1BS	58.7	J	85.1	JF	*1.450	100	J	124	JF	*1.240	26.4	J	26.4	J	ND or <QL	1.09	J	1.09	J	ND or <QL	8.74	J	8.74	J	ND or <QL
08A-0026-C1CS	21.6	J	21.6	J	ND or <QL	7.78	J	7.78	J	ND or <QL	7.89	J	7.89	J	ND or <QL	0.328	J	0.328	J	ND or <QL	2.27	J	2.27	J	ND or <QL
08A-0026-C1DS	0.687	J	0.687	J	ND or <QL	< 0.0701	U	< 0.0701	U	ND or <QL	0.241	J	0.241	J	ND or <QL	< 0.0818	U	< 0.0818	U	ND or <QL	< 0.0913	U	< 0.0913	U	ND or <QL
08A-0026-C1ES	0.542	J	< 1.35	U	Split-Replaced	< 0.0813	U	< 0.151	U	Split-Replaced	0.518	J	2.78	BJ	Split-Replaced	< 0.0990	U	< 0.189	U	Split-Replaced	0.142	J	< 0.452	U	Split-Replaced
08A-0027-C1AS	8.68	J	8.68	J	ND or <QL	8.64	J	8.64	J	ND or <QL	5.86	J	5.86	J	ND or <QL	0.157	J	0.157	J	ND or <QL	1.68	J	1.68	J	ND or <QL
08A-0027-C1BS	12.4	J	12.4	J	ND or <QL	11.3	J	11.3	J	ND or <QL	6.9	J	6.9	J	ND or <QL	0.344	J	0.344	J	ND or <QL	2.01	J	2.01	J	ND or <QL
08A-0027-C1CS	6.6	J	6.6	J	ND or <QL	9.69	J	9.69	J	ND or <QL	3.82	J	3.82	J	ND or <QL	0.238	J	0.238	J	ND or <QL	1.24	J	1.24	J	ND or <QL
08A-0027-C1DS	45.4	J	65.8	JF	*1.449	62	J	76.6	JF	*1.235	24.8	J	24.8	J	ND or <QL	1.02	J	1.02	J	ND or <QL	7.49	J	7.49	J	ND or <QL
08A-0027-C1ES	20.8	J	20.8	J	ND or <QL	13.9	J	13.9	J	ND or <QL	9.73	J	9.73	J	ND or <QL	0.384	J	0.384	J	ND or <QL	2.77	J	2.77	J	ND or <QL
08A-0027-C1FS	149	J	216	JF	*1.450	43.4	J	53.6	JF	*1.235	64.5	J	89.6	JF	*1.389	1.34	J	1.34	J	ND or <QL	15.6	J	15.6	J	ND or <QL
08A-0027-C1GS	126		183	F	*1.452	119		147	F	*1.235	62.7		87.1	F	*1.389	2.33	J	2.33	J	ND or <QL	23.5	J	23.5	J	ND or <QL
08A-0027-C1HS	40.4	J	58.5	JF	*1.448	58.9	J	72.7	JF	*1.234	19.7	J	19.7	J	ND or <QL	0.491	J	0.491	J	ND or <QL	22.4	J	22.4	J	ND or <QL
08A-0027-C1IS	42.3		61.3	F	*1.449	73.3		90.5	F	*1.235	19	J	19	J	ND or <QL	0.544	J	0.544	J	ND or <QL	12.3	J	12.3	J	ND or <QL
08A-0028-C2AS	20.9	J	20.9	J	ND or <QL	33.9	J	33.9	J	ND or <QL	14.9	J	14.9	J	ND or <QL	< 1.14	UJ	< 1.14	UJ	ND or <QL	3.73	J	3.73	J	ND or <QL
08A-0028-C2BS	22.5	J	22.5	J	ND or <QL	24.1	J	24.1	J	ND or <QL	14.6	J	14.6	J	ND or <QL	< 0.696	UJ	< 0.696	UJ	ND or <QL	3.66	J	3.66	J	ND or <QL
08A-0028-C2CS	35.7	J	35.7	J	ND or <QL	43	J	53.1	JF	*1.235	12.1	J	12.1	J	ND or <QL	0.853	J	0.853	J	ND or <QL	6.21	J	6.21	J	ND or <QL
08A-0028-C2DS	31	J	31	J	ND or <QL	32.5	J	32.5	J	ND or <QL	16	J	16	J	ND or <QL	< 0.930	UJ	< 0.930	UJ	ND or <QL	4.44	J	4.44	J	ND or <QL
08A-0028-C2ES	83.5	J	121	JF	*1.449	50.7	J	62.6	JF	*1.235	40.3	J	56	JF	*1.390	1.89	J	1.89	J	ND or <QL	15	J	15	J	ND or <QL
08A-0028-C2FS	168	J	243	JF	*1.446	189	J	233	JF	*1.233	54.2	J	75.3	JF	*1.389	2.67	J	2.67	J	ND or <QL	42.7	J	42.7	J	None
08A-0028-C2GS	3.19	J	3.19	J	ND or <QL	5.33	J	5.33	J	ND or <QL	2.1	J	2.1	J	ND or <QL	0.395	J	0.395	J	ND or <QL	1.26	J	1.26	J	ND or <QL
08A-0028-D1AS	12.3	J	12.3	J	ND or <QL	13.5	J	13.5	J	ND or <QL	7.51	J	7.51	J	ND or <QL	0.345	J	0.345	J	ND or <QL	2.94	J	2.94	J	ND or <QL
08A-0028-D1BS	30.5	J	30.5	J	ND or <QL	33.5	J	33.5	J	ND or <QL	21.3	J	21.3	J	ND or <QL	0.613	J	0.613	J	ND or <QL	6.07	J	6.07	J	ND or <QL
08A-0028-D1CS	30.9	J	30.9	J	ND or <QL	36.7	J	36.7	J	ND or <QL	20.7	J	20.7	J	ND or <QL	0.518	J	0.518	J	ND or <QL	7.44	J	7.44	J	ND or <QL
08A-0028-D1DS	19.6	J	19.6	J	ND or <QL	19.5</																			

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,6,7,8-HxCDD 57653-85-7 ng/kg					1,2,3,6,7,8-HxCDF 57117-44-9 ng/kg					1,2,3,7,8,9-HxCDD 19408-74-3 ng/kg					1,2,3,7,8,9-HxCDF 72918-21-9 ng/kg					1,2,3,7,8-PeCDD 40321-76-4 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0030-C1ES	36.5	J	52.9	JF	*1.449	37.5	J	46.3	JF	*1.235	14.2	J	14.2	J	ND or <QL	< 0.506	UJ	< 0.506	UJ	ND or <QL	13	J	13	J	ND or <QL
08A-0030-C1FS	7.16	J	7.16	J	ND or <QL	5.91	J	5.91	J	ND or <QL	1.71	J	1.71	J	ND or <QL	< 0.527	UJ	< 0.527	UJ	ND or <QL	1.07	J	1.07	J	ND or <QL
08A-0030-C1GS	< 0.160	U	< 0.160	U	ND or <QL	< 0.208	U	< 0.208	U	ND or <QL	< 0.129	U	< 0.129	U	ND or <QL	< 0.161	UJ	< 0.161	UJ	ND or <QL	< 0.305	U	< 0.305	U	ND or <QL
08A-0031-C1AS	26.1	J	26.1	J	ND or <QL	22.7	J	22.7	J	ND or <QL	14.1	J	14.1	J	ND or <QL	< 0.475	UJ	< 0.475	UJ	ND or <QL	4.87	J	4.87	J	ND or <QL
08A-0031-C1BS	61.4	J	89	JF	*1.450	55.7	J	68.8	JF	*1.235	27.7	J	27.7	J	ND or <QL	< 1.12	UJ	< 1.12	UJ	ND or <QL	10.8	J	10.8	J	ND or <QL
08A-0031-C1CS	21.3	J	21.3	J	ND or <QL	18.6	J	18.6	J	ND or <QL	10.1	J	10.1	J	ND or <QL	< 0.623	UJ	< 0.623	UJ	ND or <QL	6.25	J	6.25	J	ND or <QL
08A-0031-C1DS	152	J	220	JF	*1.447	133	J	164	JF	*1.233	47.5	J	66	JF	*1.389	< 1.85	UJ	< 1.85	UJ	ND or <QL	72.1	J	72.1	J	None
08A-0031-C1ES	6.51	J	6.51	J	ND or <QL	28.5		35.2	F	*1.235	3.56	J	3.56	J	ND or <QL	< 1.67	U	< 1.67	U	ND or <QL	2.83	J	2.83	J	ND or <QL
08A-0031-C1FS	< 0.267	U	< 0.267	U	ND or <QL	< 0.208	U	< 0.208	U	ND or <QL	< 0.251	UJ	< 0.251	UJ	ND or <QL	< 0.173	U	< 0.173	U	ND or <QL	< 0.295	U	< 0.295	U	ND or <QL
08A-0032-C2AS	10.3	J	10.3	J	ND or <QL	11.5	J	11.5	J	ND or <QL	6.59	J	6.59	J	ND or <QL	< 0.344	UJ	< 0.344	UJ	ND or <QL	2.35	J	2.35	J	ND or <QL
08A-0032-C2BS	19.4	J	19.4	J	ND or <QL	25	J	25	J	ND or <QL	10.4	J	10.4	J	ND or <QL	< 0.547	UJ	< 0.547	UJ	ND or <QL	3.79	J	3.79	J	ND or <QL
08A-0032-C2CS	44.3	J	64.2	JF	*1.449	55.7	J	68.8	JF	*1.235	24.3	J	24.3	J	ND or <QL	< 1.55	UJ	< 1.55	UJ	ND or <QL	8.08	J	8.08	J	ND or <QL
08A-0032-C2DS	118	J	171	JF	*1.449	85	J	105	JF	*1.235	48	J	66.7	JF	*1.390	< 2.78	UJ	< 2.78	UJ	ND or <QL	24.2	J	24.2	J	ND or <QL
08A-0032-C2ES	165	J	239	JF	*1.448	654	J	808	JF	*1.235	110	J	153	JF	*1.391	9.23	J	9.23	J	ND or <QL	82.2	J	82.2	J	None
08A-0032-C2FS	13.2	J	13.2	J	ND or <QL	12.1	J	12.1	J	ND or <QL	6.31	J	6.31	J	ND or <QL	< 0.226	UJ	< 0.226	UJ	ND or <QL	8.53	J	8.53	J	ND or <QL
08A-0032-C2GS	21	J	21	J	ND or <QL	30	J	30	J	ND or <QL	9.12	J	9.12	J	ND or <QL	< 1.22	UJ	< 1.22	UJ	ND or <QL	4.41	J	4.41	J	ND or <QL
08A-0032-C2HS	6.82	J	6.82	J	ND or <QL	14.2	J	14.2	J	ND or <QL	2.64	J	2.64	J	ND or <QL	< 0.676	UJ	< 0.676	UJ	ND or <QL	1.21	J	1.21	J	ND or <QL
08A-0032-C2IS	0.973	J	0.973	J	ND or <QL	3.98	J	3.98	J	ND or <QL	1.06	J	1.06	J	ND or <QL	0.323	J	0.323	J	ND or <QL	0.298	J	0.298	J	ND or <QL
08A-0033-C1AS	21.2	J	21.2	J	ND or <QL	22.8	J	22.8	J	ND or <QL	14.7	J	14.7	J	ND or <QL	< 0.863	UJ	< 0.863	UJ	ND or <QL	4.57	J	4.57	J	ND or <QL
08A-0033-C1BS	32	J	46.4	JF	*1.450	36.6	J	45.2	JF	*1.235	18.7	J	18.7	J	ND or <QL	< 0.555	UJ	< 0.555	UJ	ND or <QL	6.19	J	6.19	J	ND or <QL
08A-0033-C1CS	22.6	J	22.6	J	ND or <QL	31.1	J	31.1	J	ND or <QL	13.2	J	13.2	J	ND or <QL	< 0.556	UJ	< 0.556	UJ	ND or <QL	3.97	J	3.97	J	ND or <QL
08A-0033-C1DS	60.3	J	87.4	JF	*1.449	101	J	125	JF	*1.238	38.6	J	38.6	J	ND or <QL	< 1.16	UJ	< 1.16	UJ	ND or <QL	12.3	J	12.3	J	ND or <QL
08A-0033-C1ES	23.2	J	33.6	JF	*1.448	26.3	J	32.5	JF	*1.236	12.7	J	12.7	J	ND or <QL	< 0.620	UJ	< 0.620	UJ	ND or <QL	4.67	J	4.67	J	ND or <QL
08A-0033-C1ET	3.82	J	3.82	J	ND or <QL	6.07	J	6.07	J	ND or <QL	2.1	J	2.1	J	ND or <QL	< 0.213	UJ	< 0.213	UJ	ND or <QL	1.18	J	1.18	J	ND or <QL
08A-0034-C1AS	8.69	J	8.69	J	ND or <QL	9.06	J	9.06	J	ND or <QL	4.41	J	4.41	J	ND or <QL	< 0.337	U	< 0.337	U	ND or <QL	1.94	J	1.94	J	ND or <QL
08A-0034-C1BS	17.7	J	17.7	J	ND or <QL	21.8	J	21.8	J	ND or <QL	10.8	J	10.8	J	ND or <QL	< 0.467	U	< 0.467	U	ND or <QL	3.61	J	3.61	J	ND or <QL
08A-0034-C1CS	40.9		59.3	F	*1.450	29.4		36.3	F	*1.235	24.2		33.6	F	*1.388	< 0.947	U	< 0.947	U	ND or <QL	8.9	J	8.9	J	ND or <QL
08A-0034-D2AS	9.32	J	9.32	J	ND or <QL	9.31	J	9.31	J	ND or <QL	6.96	J	6.96	J	ND or <QL	< 0.279	U	< 0.279	U	ND or <QL	2.56	J	2.56	J	ND or <QL
08A-0034-D2BS	6.13	J	6.13	J	ND or <QL	4.91	J	4.91	J	ND or <QL	4.13	J	4.13	J	ND or <QL	< 0.897	U	< 0.897	U	ND or <QL	1.67	J	1.67	J	ND or <QL
08A-0034-D2CS	14	J	14	J	ND or <QL	12.8	J	12.8	J	ND or <QL	9.86	J	9.86	J	ND or <QL	< 1.05	U	< 1.05	U	ND or <QL	3.08	J	3.08	J	ND or <QL
08A-0034-D2DS	14.9	J	14.9	J	ND or <QL	17	J	17	J	ND or <QL	10	J	10	J	ND or <QL	< 0.978	U	< 0.978	U	ND or <QL	3.02	J	3.02	J	ND or <QL
08A-0034-D2ES	15.4	J	15.4	J	ND or <QL	12.5	J	12.5	J	ND or <QL	8.64	J	8.64	J	ND or <QL	< 0.238	U	< 0.238	U	ND or <QL	2.75	J	2.75	J	ND or <QL
08A-0035-C5AS	0.995	J	0.995	J	ND or <QL	1.75	J	1.75	J	ND or <QL	0.783	J	0.783	J	ND or <QL	0.274	J	0.274	J	ND or <QL	0.535	J	0.535	J	ND or <QL
08A-0036-C2AS	6.76	J	6.76	J	ND or <QL	6.75	J	6.75	J	ND or <QL	4.79	J	4.79	J	ND or <QL	< 0.150	U	< 0.150	U	ND or <QL	1.58	J	1.58	J	ND or <QL
08A-0036-C2BS	11.5	J	11.5	J	ND or <QL	2.92	J	2.92	J	ND or <QL	4.1	J	4.1	J	ND or <QL	< 0.104	U	< 0.104	U	ND or <QL	0.852	J	0.852	J	ND or <QL
08A-0036-C2CS	44.4		64.3	F	*1.448	33.2		41	F	*1.235															

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,6,7,8-HxCDD 57653-85-7 ng/kg					1,2,3,6,7,8-HxCDF 57117-44-9 ng/kg					1,2,3,7,8,9-HxCDD 19408-74-3 ng/kg					1,2,3,7,8,9-HxCDF 72918-21-9 ng/kg					1,2,3,7,8-PeCDD 40321-76-4 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0039-C1AS	16.1	J	16.1	J	ND or <QL	16.5	J	16.5	J	ND or <QL	10.5	J	10.5	J	ND or <QL	0.404	J	0.404	J	ND or <QL	2.98	J	2.98	J	ND or <QL
08A-0039-C1BS	17.5	J	17.5	J	ND or <QL	20.7	J	20.7	J	ND or <QL	13.2	J	13.2	J	ND or <QL	< 0.484	UJ	< 0.484	UJ	ND or <QL	3.74	J	3.74	J	ND or <QL
08A-0039-C1CS	22.2	J	22.2	J	ND or <QL	20.8	J	20.8	J	ND or <QL	14	J	14	J	ND or <QL	< 0.754	U	< 0.754	U	ND or <QL	4.16	J	4.16	J	ND or <QL
08A-0039-C1DS	63.2		91.6	F	*1.449	27.6		34.1	F	*1.236	29.1		40.4	F	*1.388	< 0.661	U	< 0.661	U	ND or <QL	8.92	J	8.92	J	ND or <QL
08A-0039-C1ES	42.4		61.4	F	*1.448	20.8	J	20.8	J	ND or <QL	20.7	J	20.7	J	ND or <QL	< 0.482	U	< 0.482	U	ND or <QL	12.2	J	12.2	J	ND or <QL
08A-0039-C1FS	87.3	J	126	JF	*1.443	63.2	J	78.1	JF	*1.236	41.5	J	57.6	JF	*1.388	< 1.91	UJ	< 1.91	UJ	ND or <QL	22.2	J	22.2	J	ND or <QL
08A-0039-C1GS	50.2		72.7	F	*1.448	50.4		62.2	F	*1.234	26.8		37.2	F	*1.388	< 1.97	U	< 1.97	U	ND or <QL	10	J	10	J	ND or <QL
08A-0039-C1HS	73.7	J	107	JF	*1.452	62.3	J	76.9	JF	*1.234	34.7	J	48.2	JF	*1.389	< 2.02	UJ	< 2.02	UJ	ND or <QL	14.9	J	14.9	J	ND or <QL
08A-0040-C1AS	25.8	J	25.8	J	ND or <QL	28.4		35.1	F	*1.236	14.2	J	14.2	J	ND or <QL	< 1.55	U	< 1.55	U	ND or <QL	7.03	J	7.03	J	ND or <QL
08A-0040-C1BS	71.5		104	F	*1.455	79.4		98.1	F	*1.236	41.8		58.1	F	*1.390	1.29	J	1.29	J	ND or <QL	24.5		24.5		None
08A-0040-C1CS	72.9		106	F	*1.454	74.2		91.6	F	*1.235	38.9		54	F	*1.388	1.48	J	1.48	J	ND or <QL	49.4		49.4		None
08A-0040-C1CT	73.8		107	F	*1.450	71		87.7	F	*1.235	36.6		50.8	F	*1.388	2.12	J	2.12	J	ND or <QL	51.6		51.6		None
08A-0040-C1DS	52.5		76.1	F	*1.450	52.5		64.8	F	*1.234	33.4		46.4	F	*1.389	1.27	J	1.27	J	ND or <QL	14.1	J	14.1	J	ND or <QL
08A-0040-C1ES	26.9	J	26.9	J	ND or <QL	27.5	J	27.5	J	ND or <QL	15.9	J	15.9	J	ND or <QL	1.37	J	1.37	J	ND or <QL	6.26	J	6.26	J	ND or <QL
08A-0040-C1ET	22.3		32.3	F	*1.448	19		23.5	F	*1.237	12.1	J	12.1	J	ND or <QL	0.658	J	0.658	J	ND or <QL	4.57	J	4.57	J	ND or <QL
08A-0041-C1AS	31.3	J	31.3	J	ND or <QL	25.5	J	25.5	J	ND or <QL	15.4	J	15.4	J	ND or <QL	2.58	J	2.58	J	ND or <QL	7.61	J	7.61	J	ND or <QL
08A-0041-C1BS	241		349	F	*1.448	26.9		33.2	F	*1.234	52.7		73.2	F	*1.389	1.85	J	1.85	J	ND or <QL	10.5	J	10.5	J	ND or <QL
08A-0041-C1CS	13	J	13	J	ND or <QL	7.54	J	7.54	J	ND or <QL	6.62	J	6.62	J	ND or <QL	< 0.718	UJ	< 0.718	UJ	ND or <QL	2.7	J	2.7	J	ND or <QL
08A-0041-C1DS	87.4	J	127	JF	*1.453	66.5	J	82.1	JF	*1.235	37.6	J	52.2	JF	*1.388	< 1.02	UJ	< 1.02	UJ	ND or <QL	32.9	J	32.9	J	ND or <QL
08A-0041-C1DT	35.8	J	51.9	JF	*1.450	30.7	J	30.7	J	ND or <QL	18.1	J	18.1	J	ND or <QL	< 1.37	UJ	< 1.37	UJ	ND or <QL	13.3	J	13.3	J	ND or <QL
08A-0041-C1ES	3.53	J	3.53	J	ND or <QL	3.22	J	3.22	J	ND or <QL	1.97	J	1.97	J	ND or <QL	< 0.474	UJ	< 0.474	UJ	ND or <QL	1.14	J	1.14	J	ND or <QL
08A-0042-C2AS	38.6	J	38.6	J	ND or <QL	43.7	J	43.7	J	ND or <QL	25	J	25	J	ND or <QL	3.13	J	3.13	J	ND or <QL	9.6	J	9.6	J	ND or <QL
08A-0042-C2BS	4.49	J	4.49	J	ND or <QL	3.52	J	3.52	J	ND or <QL	3.16	J	3.16	J	ND or <QL	1.17	J	1.17	J	ND or <QL	1.63	J	1.63	J	ND or <QL
08A-0042-C2CS	56.9	J	82.4	JF	*1.448	64.2	J	79.3	JF	*1.235	34.6	J	48.1	JF	*1.390	1.35	J	1.35	J	ND or <QL	11.3	J	11.3	J	ND or <QL
08A-0042-C2DS	33.6		48.7	F	*1.449	25		30.9	F	*1.236	17.6		24.4	F	*1.386	1.06	J	1.06	J	ND or <QL	6.09	J	6.09	J	ND or <QL
08A-0042-C2ES	127	J	184	JF	*1.449	172	J	212	JF	*1.233	55.5	J	77.1	JF	*1.389	2.64	J	2.64	J	ND or <QL	35.6	J	35.6	J	None
08A-0043-C2AS	26.2	J	26.2	J	ND or <QL	29.6	J	29.6	J	ND or <QL	14.9	J	14.9	J	ND or <QL	< 1.36	UJ	< 1.36	UJ	ND or <QL	4.85	J	4.85	J	ND or <QL
08A-0043-C2BS	9.47	J	75.8	B	Split-Replaced	4.19	J	32	B	Split-Replaced	4.18	J	47.2		Split-Replaced	< 0.258	U	1.15	U	Split-Replaced	1.69	J	13.5	B	Split-Replaced
08A-0043-C2CS	262	J	305	B	Split-Replaced	83	J	77.7	B	Split-Replaced	127	J	167		Split-Replaced	2.89	J	3.87	EZ	Split-Replaced	30.9	J	34.4	B	Split-Replaced
08A-0043-C2DS	79	J	114	JF	*1.443	24.1	J	24.1	J	ND or <QL	36.1	J	36.1	J	ND or <QL	< 0.647	UJ	< 0.647	UJ	ND or <QL	8.96	J	8.96	J	ND or <QL
08A-0044-C1AS	18.3	J	18.3	J	ND or <QL	31.6	J	39	JF	*1.234	11.5	J	11.5	J	ND or <QL	0.748	J	0.748	J	ND or <QL	3.93	J	3.93	J	ND or <QL
08A-0044-C1BS	32.7		47.4	F	*1.450	27.5	J	27.5	J	ND or <QL	18.4	J	18.4	J	ND or <QL	0.408	J	0.408	J	ND or <QL	6.5	J	6.5	J	ND or <QL
08A-0044-C1CS	7.47	J	7.47	J	ND or <QL	5.09	J	5.09	J	ND or <QL	3.76	J	3.76	J	ND or <QL	< 0.171	U	< 0.171	U	ND or <QL	1.54	J	1.54	J	ND or <QL
08A-0044-C1DS	2.67	J	2.67	J	ND or <QL	0.28	J	0.28	J	ND or <QL	0.982	J	0.982	J	ND or <QL	< 0.157	U	< 0.157	U	ND or <QL	0.408	J	0.408	J	ND or <QL
08A-0044-C1ES	1.76	J	1.76	J	ND or <QL	0.203	J	0.203	J	ND or <QL	0.73	J	0.73	J	ND or <QL	< 0.105	U	< 0.105	U	ND or <QL	0.371	J	0.371	J	ND or <QL
08A-0045-C2AS	57.1	J	82.7	JF	*1.448	106	J	131	JF	*1.236	29.6	J	29.6	J	ND or <QL	< 1.92	UJ	< 1.92	UJ	ND or <QL	16.4	J	16.4	J	ND or <QL
08A-0045-C2BS	177	J	256	JF	*1.446	397	J	490	JF	*1.234	96.6	J	134	JF	*1.387	4.14	J	4.14	J	ND or <QL	84	J	84	J	None
08A-0045-C2CS</																									

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,6,7,8-HxCDD 57653-85-7 ng/kg					1,2,3,6,7,8-HxCDF 57117-44-9 ng/kg					1,2,3,7,8,9-HxCDD 19408-74-3 ng/kg					1,2,3,7,8,9-HxCDF 72918-21-9 ng/kg					1,2,3,7,8-PeCDD 40321-76-4 ng/kg				
	Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted		
	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]
08A-0047-D4CS	9.12	J	9.12	J	ND or <QL	5.78	J	5.78	J	ND or <QL	5.42	J	5.42	J	ND or <QL	< 0.689	UJ	< 0.689	UJ	ND or <QL	2.07	J	2.07	J	ND or <QL
08A-0047-D4DS	3.23	J	3.23	J	ND or <QL	3.59	J	3.59	J	ND or <QL	< 1.99	U	< 1.99	U	ND or <QL	< 0.0814	U	< 0.0814	U	ND or <QL	0.894	J	0.894	J	ND or <QL
08A-0047-D4ES	7.75	J	7.75	J	ND or <QL	5.4	J	5.4	J	ND or <QL	4.06	J	4.06	J	ND or <QL	< 0.211	U	< 0.211	U	ND or <QL	1.36	J	1.36	J	ND or <QL
08A-0048-C2AS	2.88	J	2.88	J	ND or <QL	4.02	J	4.02	J	ND or <QL	1.87	J	1.87	J	ND or <QL	< 0.198	UJ	< 0.198	UJ	ND or <QL	0.721	J	0.721	J	ND or <QL
08A-0048-C2BS	8.58		12.4	F	*1.445	1.81	J	1.81	J	ND or <QL	2.79	J	2.79	J	ND or <QL	0.219	J	0.219	J	ND or <QL	1.68	J	1.68	J	ND or <QL
08A-0048-C2CS	3.73	J	3.73	J	ND or <QL	1.16	J	1.16	J	ND or <QL	1.87	J	1.87	J	ND or <QL	< 0.0989	UJ	< 0.0989	UJ	ND or <QL	< 0.104	UJ	< 0.104	UJ	ND or <QL
08A-0048-C2DS	< 0.176	U	< 0.176	U	ND or <QL	< 0.118	U	< 0.118	U	ND or <QL	< 0.155	U	< 0.155	U	ND or <QL	< 0.138	U	< 0.138	U	ND or <QL	< 0.116	U	< 0.116	U	ND or <QL
08A-0048-C2ES	< 0.124	U	< 0.124	U	ND or <QL	< 0.158	U	< 0.158	U	ND or <QL	< 0.108	U	< 0.108	U	ND or <QL	< 0.188	U	< 0.188	U	ND or <QL	< 0.126	U	< 0.126	U	ND or <QL
08A-0049-C1AS	2.02	J	2.02	J	ND or <QL	2.07	J	2.07	J	ND or <QL	1.44	J	1.44	J	ND or <QL	< 0.145	U	< 0.145	U	ND or <QL	< 0.192	U	< 0.192	U	ND or <QL
08A-0049-C1BS	3.59	J	3.59	J	ND or <QL	8.75	J	8.75	J	ND or <QL	2.45	J	2.45	J	ND or <QL	< 0.131	U	< 0.131	U	ND or <QL	0.913	J	0.913	J	ND or <QL
08A-0049-C1CS	3.34	J	3.34	J	ND or <QL	7.4	J	7.4	J	ND or <QL	2.14	J	2.14	J	ND or <QL	< 0.168	U	< 0.168	U	ND or <QL	1.06	J	1.06	J	ND or <QL
08A-0049-C1DS	5.38	J	5.38	J	ND or <QL	3.85	J	3.85	J	ND or <QL	2.8	J	2.8	J	ND or <QL	< 0.253	U	< 0.253	U	ND or <QL	0.861	J	0.861	J	ND or <QL
08A-0049-C2ES	4.03	J	4.03	J	ND or <QL	3.54	J	3.54	J	ND or <QL	2.18	J	2.18	J	ND or <QL	< 0.249	U	< 0.249	U	ND or <QL	0.749	J	0.749	J	ND or <QL
08A-0050-C1AS	7.66	J	7.66	J	ND or <QL	6.75	J	6.75	J	ND or <QL	4.01	J	4.01	J	ND or <QL	0.29	J	0.29	J	ND or <QL	1.78	J	1.78	J	ND or <QL
08A-0050-C1BS	13	J	22.9	B	Split-Replaced	9.09	J	18.7	B	Split-Replaced	5.62	J	17.8		Split-Replaced	0.486	J	< 1.12	U	Split-Replaced	2.75	J	7.71	BJ	Split-Replaced
08A-0050-C1CS	22.7		28.9	B	Split-Replaced	14.2	J	19.4	B	Split-Replaced	9.21	J	18.6		Split-Replaced	0.5	J	< 0.755	U	Split-Replaced	6.9	J	11.6	B	Split-Replaced
08A-0050-C1DS	< 0.582	U	< 0.582	U	ND or <QL	< 0.121	U	< 0.121	U	ND or <QL	< 0.362	U	< 0.362	U	ND or <QL	< 0.144	U	< 0.144	U	ND or <QL	< 0.146	U	< 0.146	U	ND or <QL
08A-0051-C1AS	4.17	J	4.17	J	ND or <QL	5.23	J	5.23	J	ND or <QL	2.5	J	2.5	J	ND or <QL	0.153	J	0.153	J	ND or <QL	0.922	J	0.922	J	ND or <QL
08A-0051-C1BS	2.35	J	< 1.05	U	Split-Replaced	0.48	J	< 0.891	U	Split-Replaced	0.718	J	0.924	EZ	Split-Replaced	< 0.216	U	< 0.2	U	Split-Replaced	< 0.0666	U	< 0.333	U	Split-Replaced
08A-0051-C2CS	1.62	J	1.99	EZ	Split-Replaced	1.25	J	2.68	BJ	Split-Replaced	1.05	J	1.18	EZ	Split-Replaced	< 0.196	U	< 0.411	U	Split-Replaced	0.504	J	< 0.592	U	Split-Replaced
08A-0052-C2AS	3.16	J	3.16	J	ND or <QL	2.77	J	2.77	J	ND or <QL	1.65	J	1.65	J	ND or <QL	0.101	J	0.101	J	ND or <QL	0.729	J	0.729	J	ND or <QL
08A-0054-C3AS	< 0.236	UJ	< 0.236	UJ	ND or <QL	< 0.199	UJ	< 0.199	UJ	ND or <QL	< 0.113	U	< 0.113	U	ND or <QL	< 0.0363	U	< 0.0363	U	ND or <QL	0.118	J	0.118	J	ND or <QL
08A-0054-C3BS	< 0.0881	UJ	< 0.0881	UJ	ND or <QL	< 0.0352	U	< 0.0352	U	ND or <QL	< 0.0518	UJ	< 0.0518	UJ	ND or <QL	< 0.0430	U	< 0.0430	U	ND or <QL	< 0.0268	U	< 0.0268	U	ND or <QL
08A-0054-C3CS	< 0.0182	U	< 0.0182	U	ND or <QL	< 0.0543	U	< 0.0543	U	ND or <QL	< 0.0156	U	< 0.0156	U	ND or <QL	< 0.0198	U	< 0.0198	U	ND or <QL	< 0.0191	U	< 0.0191	U	ND or <QL
08A-0055-C2AS	31.4	J	31.4	J	ND or <QL	34.4	J	34.4	J	ND or <QL	20.8	J	20.8	J	ND or <QL	1.89	J	1.89	J	ND or <QL	7.56	J	7.56	J	ND or <QL
08A-0055-C2BS	19.1	J	19.1	J	ND or <QL	16.2	J	16.2	J	ND or <QL	10.5	J	10.5	J	ND or <QL	0.458	J	0.458	J	ND or <QL	4.42	J	4.42	J	ND or <QL
08A-0055-C2CS	< 0.258	U	< 0.258	U	ND or <QL	< 0.179	U	< 0.179	U	ND or <QL	< 0.216	U	< 0.216	U	ND or <QL	< 0.185	U	< 0.185	U	ND or <QL	< 0.286	U	< 0.286	U	ND or <QL
08A-0055-C2DS	< 0.242	U	< 0.242	U	ND or <QL	< 0.152	U	< 0.152	U	ND or <QL	< 0.203	U	< 0.203	U	ND or <QL	< 0.167	U	< 0.167	U	ND or <QL	< 0.212	U	< 0.212	U	ND or <QL
08A-0055-C2ES	< 0.284	U	< 0.284	U	ND or <QL	< 0.156	U	< 0.156	U	ND or <QL	< 0.218	U	< 0.218	U	ND or <QL	< 0.165	U	< 0.165	U	ND or <QL	< 0.175	U	< 0.175	U	ND or <QL
08A-0055-C2FS	< 0.368	U	< 0.368	U	ND or <QL	< 0.218	U	< 0.218	U	ND or <QL	< 0.317	U	< 0.317	U	ND or <QL	< 0.225	U	< 0.225	U	ND or <QL	< 0.316	U	< 0.316	U	ND or <QL
08A-0056-C2AS	14.9	J	14.9	J	ND or <QL	11.9	J	11.9	J	ND or <QL	15.1	J	15.1	J	ND or <QL	0.325	J	0.325	J	ND or <QL	3.31	J	3.31	J	ND or <QL
08A-0056-C2BS	6.74	J	6.74	J	ND or <QL	4.77	J	4.77	J	ND or <QL	3.58	J	3.58	J	ND or <QL	0.13	J	0.13	J	ND or <QL	1.44	J	1.44	J	ND or <QL
08A-0056-C2CS	10.3	J	10.3	J	ND or <QL	6.71	J	6.71	J	ND or <QL	5.01	J	5.01	J	ND or <QL	0.113	J	0.113	J	ND or <QL	2.02	J	2.02	J	ND or <QL
08A-0056-C2DS	44.7		64.8	F	*1.450	33.1		40.9	F	*1.236	21.4		29.7	F	*1.388	0.997	J	0.997	J	ND or <QL	9.94	J	9.94	J	ND or <QL
08A-0056-C2ES	89.3	J	129	JF	*1.445	75.5	J	93.2	JF	*1.234	49	J	68.1	JF	*1.390	1.61	J	1.61	J	ND or <QL					

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,6,7,8-HxCDD 57653-85-7 ng/kg					1,2,3,6,7,8-HxCDF 57117-44-9 ng/kg					1,2,3,7,8,9-HxCDD 19408-74-3 ng/kg					1,2,3,7,8,9-HxCDF 72918-21-9 ng/kg					1,2,3,7,8-PeCDD 40321-76-4 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0058-C1FS	0.569	J	0.569	J	ND or <QL	0.521	J	0.521	J	ND or <QL	0.454	J	0.454	J	ND or <QL	< 0.168	U	< 0.168	U	ND or <QL	< 0.176	U	< 0.176	U	ND or <QL
08A-0060-C1AS	30.9	J	30.9	J	ND or <QL	20.4	J	20.4	J	ND or <QL	21.9	J	21.9	J	ND or <QL	< 0.475	UJ	< 0.475	UJ	ND or <QL	5.27	J	5.27	J	ND or <QL
08A-0060-C1BS	9.43	J	9.43	J	ND or <QL	11.4	J	11.4	J	ND or <QL	7.17	J	7.17	J	ND or <QL	< 2.02	UJ	< 2.02	UJ	ND or <QL	2	J	2	J	ND or <QL
08A-0060-C1CS	49.3	J	71.4	JF	*1.448	64.4	J	79.5	JF	*1.234	35.3	J	35.3	J	ND or <QL	1.36	J	1.36	J	ND or <QL	8.95	J	8.95	J	ND or <QL
08A-0060-C1DS	35.7	J	35.7	J	ND or <QL	57.4	J	70.9	JF	*1.235	24.7	J	24.7	J	ND or <QL	0.911	J	0.911	J	ND or <QL	7.39	J	7.39	J	ND or <QL
08A-0060-C1ES	7.37	J	7.37	J	ND or <QL	10.2	J	10.2	J	ND or <QL	5.58	J	5.58	J	ND or <QL	< 0.595	U	< 0.595	U	ND or <QL	< 0.361	U	< 0.361	U	ND or <QL
08A-0060-C1FS	< 0.329	U	< 0.329	U	ND or <QL	< 0.147	U	< 0.147	U	ND or <QL	< 0.266	U	< 0.266	U	ND or <QL	< 0.157	U	< 0.157	U	ND or <QL	< 0.400	U	< 0.400	U	ND or <QL
08A-0060-C1GS	< 0.166	U	< 0.166	U	ND or <QL	0.59	J	0.59	J	ND or <QL	< 0.128	U	< 0.128	U	ND or <QL	< 0.338	U	< 0.338	U	ND or <QL	< 0.233	U	< 0.233	U	ND or <QL
08A-0061-C1AS	4.07	J	4.07	J	ND or <QL	4.38	J	4.38	J	ND or <QL	1.85	J	1.85	J	ND or <QL	< 0.295	U	< 0.295	U	ND or <QL	0.863	J	0.863	J	ND or <QL
08A-0061-C1BS	1.27	J	1.27	J	ND or <QL	1.23	J	1.23	J	ND or <QL	0.525	J	0.525	J	ND or <QL	< 0.126	U	< 0.126	U	ND or <QL	< 0.206	U	< 0.206	U	ND or <QL
08A-0061-C1CS	0.894	J	0.894	J	ND or <QL	1.1	J	1.1	J	ND or <QL	0.652	J	0.652	J	ND or <QL	< 0.197	U	< 0.197	U	ND or <QL	0.212	J	0.212	J	ND or <QL
08A-0061-C1DS	1.29	J	1.29	J	ND or <QL	1.64	J	1.64	J	ND or <QL	1.62	J	1.62	J	ND or <QL	< 0.161	U	< 0.161	U	ND or <QL	0.489	J	0.489	J	ND or <QL
08A-0061-C1ES	< 0.433	U	< 0.433	U	ND or <QL	< 0.123	U	< 0.123	U	ND or <QL	< 0.273	U	< 0.273	U	ND or <QL	< 0.147	U	< 0.147	U	ND or <QL	< 0.119	U	< 0.119	U	ND or <QL
08A-0062-C1AS	15.8	J	15.8	J	ND or <QL	24.9	J	24.9	J	ND or <QL	10.1	J	10.1	J	ND or <QL	0.775	J	0.775	J	ND or <QL	3.91	J	3.91	J	ND or <QL
08A-0062-C1BS	68.7	J	99.5	JF	*1.448	110	J	136	JF	*1.236	32.5	J	45.1	JF	*1.388	2.7	J	2.7	J	ND or <QL	13.1	J	13.1	J	ND or <QL
08A-0062-C1CS	114	J	165	JF	*1.447	174	J	215	JF	*1.236	43.3	J	60.1	JF	*1.388	4.93	J	4.93	J	ND or <QL	17.9	J	17.9	J	ND or <QL
08A-0062-C1DS	6.47	J	6.47	J	ND or <QL	13.8	J	13.8	J	ND or <QL	3.26	J	3.26	J	ND or <QL	0.802	J	0.802	J	ND or <QL	1.24	J	1.24	J	ND or <QL
08A-0062-C1ES	7.04	J	15.3	EZ	Split-Replaced	63.2		84.4	B	Split-Replaced	3.99	J	10		Split-Replaced	3.71	J	7.88	EZ	Split-Replaced	3.01	J	6.45	BJ	Split-Replaced
08A-0062-C1FS	6.23	J	4.7	BJ	Split-Replaced	30.1		23.5	B	Split-Replaced	3.75	J	3.82	J	Split-Replaced	1.29	J	1.45	BJ	Split-Replaced	1.84	J	1.66	BJ	Split-Replaced
08A-0062-C1GS	0.344	J	< 0.560	U	Split-Replaced	0.388	J	0.854	EZ	Split-Replaced	< 0.0895	U	0.478	EZ	Split-Replaced	< 0.161	U	< 0.373	U	Split-Replaced	< 0.0529	U	< 0.319	U	Split-Replaced
08A-0062-C1HS	0.279	J	0.279	J	ND or <QL	0.217	J	0.217	J	ND or <QL	0.152	J	0.152	J	ND or <QL	< 0.0499	U	< 0.0499	U	ND or <QL	< 0.0496	U	< 0.0496	U	ND or <QL
08A-0062-D1AS	7.12	J	7.12	J	ND or <QL	5.92	J	5.92	J	ND or <QL	5.38	J	5.38	J	ND or <QL	< 0.592	UJ	< 0.592	UJ	ND or <QL	< 0.746	UJ	< 0.746	UJ	ND or <QL
08A-0062-D1BS	11	J	11	J	ND or <QL	9.82	J	9.82	J	ND or <QL	7.15	J	7.15	J	ND or <QL	< 0.608	UJ	< 0.608	UJ	ND or <QL	1.95	J	1.95	J	ND or <QL
08A-0062-D1CS	33.5	J	33.5	J	ND or <QL	28.4	J	28.4	J	ND or <QL	23.6	J	23.6	J	ND or <QL	< 0.740	UJ	< 0.740	UJ	ND or <QL	6.47	J	6.47	J	ND or <QL
08A-0062-D1DS	16.9	J	16.9	J	ND or <QL	25.6	J	25.6	J	ND or <QL	8.74	J	8.74	J	ND or <QL	< 2.01	UJ	< 2.01	UJ	ND or <QL	2.85	J	2.85	J	ND or <QL
08A-0062-D1ES	108	J	156	JF	*1.444	160	J	198	JF	*1.238	41.8	J	58.1	JF	*1.390	4.32	J	4.32	J	ND or <QL	16.5	J	16.5	J	ND or <QL
08A-0062-D1ET	100	J	145	JF	*1.450	151	J	186	JF	*1.232	35	J	48.6	JF	*1.389	3.8	J	3.8	J	ND or <QL	15.2	J	15.2	J	ND or <QL
08A-0063-C1AS	28.7	J	28.7	J	ND or <QL	30	J	30	J	ND or <QL	20.6	J	20.6	J	ND or <QL	< 0.828	UJ	< 0.828	UJ	ND or <QL	10.6	J	10.6	J	ND or <QL
08A-0063-C1BS	48.6	J	48.6	J	ND or <QL	83.3	J	103	JF	*1.236	36.4	J	36.4	J	ND or <QL	2.39	J	2.39	J	ND or <QL	9.95	J	9.95	J	ND or <QL
08A-0063-C1CS	36.3	J	36.3	J	ND or <QL	64.7	J	79.9	JF	*1.235	22.9	J	22.9	J	ND or <QL	1.1	J	1.1	J	ND or <QL	7.24	J	7.24	J	ND or <QL
08A-0063-C1DS	2.38	J	2.38	J	ND or <QL	1.53	J	1.53	J	ND or <QL	1.58	J	1.58	J	ND or <QL	< 0.0736	U	< 0.0736	U	ND or <QL	0.437	J	0.437	J	ND or <QL
08A-0064-C1AS	14.2	J	14.2	J	ND or <QL	8.48	J	8.48	J	ND or <QL	7.72	J	7.72	J	ND or <QL	1.01	J	1.01	J	ND or <QL	2	J	2	J	ND or <QL
08A-0064-C1BS	0.468	J	0.468	J	ND or <QL	0.301	J	0.301	J	ND or <QL	0.248	J	0.248	J	ND or <QL	< 0.0308	U	< 0.0308	U	ND or <QL	0.14	J	0.14	J	ND or <QL
08A-0064-C1BT	0.662	J	0.662	J	ND or <QL	0.52	J	0.52	J	ND or <QL	0.394	J	0.394	J	ND or <QL	< 0.0653	U	< 0.0653	U	ND or <QL	0.139	J	0.139	J	ND or <QL
08A-0064-C1CS	< 0.147	UJ	< 0.147	UJ	ND or <QL	< 0.0638	U	< 0.0638	U	ND or <QL	< 0.0242	U	< 0.0242	U	ND or <QL	< 0.0310	U	< 0.0310	U	ND or <QL	< 0.0212	U	< 0.0212	U	ND or <QL
08A-0065-C3AS	14.8	J	14.8	J	ND or <QL	15.2	J	15.2	J	ND or <QL	9.11	J	9.												

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,6,7,8-HxCDD 57653-85-7 ng/kg					1,2,3,6,7,8-HxCDF 57117-44-9 ng/kg					1,2,3,7,8,9-HxCDD 19408-74-3 ng/kg					1,2,3,7,8,9-HxCDF 72918-21-9 ng/kg					1,2,3,7,8-PeCDD 40321-76-4 ng/kg				
	Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted		
	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]	Result	Qual	Result	Qual	Adjustment [†]
08A-0067-C2CS	28.3		41	F	*1.449	22.5	J	22.5	J	ND or <QL	15.1	J	15.1	J	ND or <QL	0.48	J	0.48	J	ND or <QL	21.1	J	21.1	J	ND or <QL
08A-0067-C2DS	< 0.198	U	< 0.198	U	ND or <QL	< 0.175	U	< 0.175	U	ND or <QL	< 0.179	U	< 0.179	U	ND or <QL	< 0.177	U	< 0.177	U	ND or <QL	< 0.142	U	< 0.142	U	ND or <QL
08A-0067-C2ES	< 0.203	U	< 0.347	U	Split-Replaced	< 0.118	U	< 0.157	U	Split-Replaced	< 0.179	U	< 0.347	U	Split-Replaced	< 0.147	U	< 0.157	U	Split-Replaced	< 0.133	U	< 0.234	U	Split-Replaced
08A-0067-C2FS	< 0.132	U	< 0.132	U	ND or <QL	< 0.140	U	< 0.140	U	ND or <QL	< 0.118	U	< 0.118	U	ND or <QL	< 0.135	U	< 0.135	U	ND or <QL	< 0.118	U	< 0.118	U	ND or <QL
08A-0068-C1AS	31.5	J	31.5	J	ND or <QL	32.4	J	32.4	J	ND or <QL	19.9	J	19.9	J	ND or <QL	0.867	J	0.867	J	ND or <QL	6.58	J	6.58	J	ND or <QL
08A-0068-C1BS	35.9	J	52	JF	*1.448	37	J	45.7	JF	*1.235	18.9	J	18.9	J	ND or <QL	0.861	J	0.861	J	ND or <QL	14.4	J	14.4	J	ND or <QL
08A-0068-C1CS	26.1		37.8	F	*1.448	13.7	J	13.7	J	ND or <QL	12.4	J	12.4	J	ND or <QL	< 0.603	U	< 0.603	U	ND or <QL	6.1	J	6.1	J	ND or <QL
08A-0068-C1DS	7.3	J	7.3	J	ND or <QL	19.5	J	19.5	J	ND or <QL	4.58	J	4.58	J	ND or <QL	0.657	J	0.657	J	ND or <QL	2.18	J	2.18	J	ND or <QL
08A-0068-C1ES	< 0.157	U	< 0.157	U	ND or <QL	0.847	J	0.847	J	ND or <QL	< 0.125	U	< 0.125	U	ND or <QL	< 0.0750	U	< 0.0750	U	ND or <QL	< 0.0818	U	< 0.0818	U	ND or <QL
08A-0068-C1ET	< 0.197	U	< 0.197	U	ND or <QL	1.18	J	1.18	J	ND or <QL	< 0.161	U	< 0.161	U	ND or <QL	< 0.142	U	< 0.142	U	ND or <QL	< 0.0734	U	< 0.0734	U	ND or <QL
08A-0069-C1AS	26.7	J	26.7	J	ND or <QL	24	J	24	J	ND or <QL	16.7	J	16.7	J	ND or <QL	0.765	J	0.765	J	ND or <QL	5.28	J	5.28	J	ND or <QL
08A-0069-C1BS	89	J	129	JF	*1.449	85.1	J	105	JF	*1.234	43.3	J	60.1	JF	*1.388	2.04	J	2.04	J	ND or <QL	21.6	J	21.6	J	ND or <QL
08A-0069-C1CS	67.9	J	98.4	JF	*1.449	85.9	J	106	JF	*1.234	28.5	J	28.5	J	ND or <QL	2.6	J	2.6	J	ND or <QL	13.4	J	13.4	J	ND or <QL
08A-0069-C1DS	8.88	J	8.88	J	ND or <QL	85.4		105	F	*1.230	3.63	J	3.63	J	ND or <QL	6.13	J	6.13	J	ND or <QL	3.1	J	3.1	J	ND or <QL
08A-0069-C1ES	0.416	J	0.416	J	ND or <QL	4.24	J	4.24	J	ND or <QL	< 0.201	U	< 0.201	U	ND or <QL	< 0.188	U	< 0.188	U	ND or <QL	< 0.135	U	< 0.135	U	ND or <QL
08A-0070-C3CS	3.82	J	3.82	J	ND or <QL	2.54	J	2.54	J	ND or <QL	2.24	J	2.24	J	ND or <QL	< 0.105	U	< 0.105	U	ND or <QL	0.73	J	0.73	J	ND or <QL
08A-0070-C3DS	2.92	J	2.92	J	ND or <QL	1.93	J	1.93	J	ND or <QL	1.65	J	1.65	J	ND or <QL	< 0.0931	U	< 0.0931	U	ND or <QL	0.591	J	0.591	J	ND or <QL
08A-0070-C3ES	8.39	J	8.39	J	ND or <QL	16.5	J	16.5	J	ND or <QL	4.27	J	4.27	J	ND or <QL	0.641	J	0.641	J	ND or <QL	2.21	J	2.21	J	ND or <QL
08A-0071-C1AS	1.76	J	1.76	J	ND or <QL	2.32	J	2.32	J	ND or <QL	1.13	J	1.13	J	ND or <QL	< 0.186	U	< 0.186	U	ND or <QL	0.533	J	0.533	J	ND or <QL
08A-0071-C1BS	1.24	J	1.24	J	ND or <QL	1.01	J	1.01	J	ND or <QL	0.885	J	0.885	J	ND or <QL	< 0.172	U	< 0.172	U	ND or <QL	0.336	J	0.336	J	ND or <QL
08A-0071-C1CS	0.487	J	0.487	J	ND or <QL	1.57	J	1.57	J	ND or <QL	0.417	J	0.417	J	ND or <QL	< 0.136	U	< 0.136	U	ND or <QL	< 0.0972	U	< 0.0972	U	ND or <QL
08A-0072-C6AS	2.96	J	2.96	J	ND or <QL	2.8	J	2.8	J	ND or <QL	1.87	J	1.87	J	ND or <QL	< 0.386	U	< 0.386	U	ND or <QL	< 0.213	U	< 0.213	U	ND or <QL
08A-0073-C4AS	12.8	J	12.8	J	ND or <QL	26.1	J	26.1	J	ND or <QL	8.51	J	8.51	J	ND or <QL	< 1.55	UJ	< 1.55	UJ	ND or <QL	2.82	J	2.82	J	ND or <QL
08A-0073-C4BS	55.7	J	80.7	JF	*1.449	75.4	J	93.1	JF	*1.235	37.9	J	37.9	J	ND or <QL	2.07	J	2.07	J	ND or <QL	11.7	J	11.7	J	ND or <QL
08A-0073-C4CS	8.34	J	8.34	J	ND or <QL	16.4	J	16.4	J	ND or <QL	5.64	J	5.64	J	ND or <QL	0.797	J	0.797	J	ND or <QL	1.77	J	1.77	J	ND or <QL
08A-0074-C2AS	17	J	17	J	ND or <QL	12.7	J	12.7	J	ND or <QL	11.4	J	11.4	J	ND or <QL	< 0.317	UJ	< 0.317	UJ	ND or <QL	3.14	J	3.14	J	ND or <QL
08A-0074-C2BS	11.2	J	11.2	J	ND or <QL	11.3	J	11.3	J	ND or <QL	8.75	J	8.75	J	ND or <QL	< 0.460	UJ	< 0.460	UJ	ND or <QL	2.37	J	2.37	J	ND or <QL
08A-0074-C2CS	11	J	11	J	ND or <QL	14.3	J	14.3	J	ND or <QL	7.52	J	7.52	J	ND or <QL	< 1.14	UJ	< 1.14	UJ	ND or <QL	2.33	J	2.33	J	ND or <QL
08A-0074-C2DS	4.38	J	4.38	J	ND or <QL	3.74	J	3.74	J	ND or <QL	2.87	J	2.87	J	ND or <QL	< 0.348	U	< 0.348	U	ND or <QL	0.644	J	0.644	J	ND or <QL
08A-0074-C2ES	34.6		50.1	F	*1.448	25.6	J	25.6	J	ND or <QL	19.9	J	19.9	J	ND or <QL	< 0.602	U	< 0.602	U	ND or <QL	4.48	J	4.48	J	ND or <QL
08A-0074-C2FS	11	J	11	J	ND or <QL	6.64	J	6.64	J	ND or <QL	6.29	J	6.29	J	ND or <QL	< 0.505	UJ	< 0.505	UJ	ND or <QL	1.66	J	1.66	J	ND or <QL
08A-0074-C2GS	62.1		90	F	*1.449	42.5		52.5	F	*1.235	33.3		46.3	F	*1.390	1.05	J	1.05	J	ND or <QL	14.7	J	14.7	J	ND or <QL
08A-0075-C1AS	3.19	J	3.19	J	ND or <QL	2.58	J	2.58	J	ND or <QL	1.95	J	1.95	J	ND or <QL	< 0.189	U	< 0.189	U	ND or <QL	0.635	J	0.635	J	ND or <QL
08A-0075-C1BS	7.08	J	7.08	J	ND or <QL	2.88	J	2.88	J	ND or <QL	3.85	J	3.85	J	ND or <QL	< 0.104	U	< 0.104	U	ND or <QL	1.82	J	1.82	J	ND or <QL
08A-0076-C5AS	38.7	J	38.7	J	ND or <QL	14.6	J	14.6	J	ND or <QL	8.34	J	8.34	J	ND or <QL	0.949	J	0.949	J	ND or <QL	5.64	J	5.64	J	ND or <QL
08A-0076-C5BS	1.49	J	1.49	J	ND or <QL	0.827	J	0.827	J	ND or <QL	1	J	1	J	ND or <QL	< 0.195	U	< 0.195	U	ND or <QL	0.309	J	0.309	J	

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,6,7,8-HxCDD 57653-85-7 ng/kg					1,2,3,6,7,8-HxCDF 57117-44-9 ng/kg					1,2,3,7,8,9-HxCDD 19408-74-3 ng/kg					1,2,3,7,8,9-HxCDF 72918-21-9 ng/kg					1,2,3,7,8-PeCDD 40321-76-4 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0079-C4AS	3.62	J	3.62	J	ND or <QL	6.66	J	6.66	J	ND or <QL	3.74	J	3.74	J	ND or <QL	0.517	J	0.517	J	ND or <QL	1.65	J	1.65	J	ND or <QL
08A-0079-C4BS	5.95	J	5.95	J	ND or <QL	2.44	J	2.44	J	ND or <QL	1.43	J	1.43	J	ND or <QL	< 0.211	U	< 0.211	U	ND or <QL	0.645	J	0.645	J	ND or <QL
08A-0079-C4CS	9.84	J	9.84	J	ND or <QL	4.65	J	4.65	J	ND or <QL	3.64	J	3.64	J	ND or <QL	< 0.139	U	< 0.139	U	ND or <QL	1.1	J	1.1	J	ND or <QL
08A-0079-C4DS	7.35	J	7.35	J	ND or <QL	3.9	J	3.9	J	ND or <QL	4.02	J	4.02	J	ND or <QL	< 0.169	U	< 0.169	U	ND or <QL	1.14	J	1.14	J	ND or <QL
08A-0079-C4ES	7.27	J	7.27	J	ND or <QL	2.61	J	2.61	J	ND or <QL	4.14	J	4.14	J	ND or <QL	< 0.230	U	< 0.230	U	ND or <QL	1.04	J	1.04	J	ND or <QL
08A-0080-C1AS	6.08	J	6.08	J	ND or <QL	3.21	J	3.21	J	ND or <QL	3.54	J	3.54	J	ND or <QL	< 0.104	U	< 0.104	U	ND or <QL	0.963	J	0.963	J	ND or <QL
08A-0080-C1BS	4.28	J	4.28	J	ND or <QL	1.95	J	1.95	J	ND or <QL	2.55	J	2.55	J	ND or <QL	< 0.183	U	< 0.183	U	ND or <QL	0.595	J	0.595	J	ND or <QL
08A-0080-C1CS	3.66	J	3.66	J	ND or <QL	1.84	J	1.84	J	ND or <QL	1.97	J	1.97	J	ND or <QL	0.274	J	0.274	J	ND or <QL	0.484	J	0.484	J	ND or <QL
08A-0080-C1DS	15.9	J	15.9	J	ND or <QL	7.25	J	7.25	J	ND or <QL	8.11	J	8.11	J	ND or <QL	< 0.388	U	< 0.388	U	ND or <QL	2.01	J	2.01	J	ND or <QL
08A-0080-C1ES	5.29	J	5.29	J	ND or <QL	3.73	J	3.73	J	ND or <QL	3	J	3	J	ND or <QL	< 0.150	U	< 0.150	U	ND or <QL	0.917	J	0.917	J	ND or <QL
08A-0081-C2AS	4.78	J	4.78	J	ND or <QL	1.79	J	1.79	J	ND or <QL	2.73	J	2.73	J	ND or <QL	< 0.0898	U	< 0.0898	U	ND or <QL	0.623	J	0.623	J	ND or <QL
08A-0081-C2BS	< 0.613	U	< 0.613	U	ND or <QL	< 0.312	UJ	< 0.312	UJ	ND or <QL	0.6	J	0.6	J	ND or <QL	< 0.0795	U	< 0.0795	U	ND or <QL	< 0.198	U	< 0.198	U	ND or <QL
08A-0081-C2CS	1.64	J	1.64	J	ND or <QL	1.15	J	1.15	J	ND or <QL	1	J	1	J	ND or <QL	< 0.0476	UJ	< 0.0476	UJ	ND or <QL	0.361	J	0.361	J	ND or <QL
08A-0081-C2DS	2.14	J	2.14	J	ND or <QL	0.991	J	0.991	J	ND or <QL	1.03	J	1.03	J	ND or <QL	< 0.251	U	< 0.251	U	ND or <QL	0.322	J	0.322	J	ND or <QL
08A-0082-C2AS	7.48	J	7.48	J	ND or <QL	3.39	J	3.39	J	ND or <QL	5.57	J	5.57	J	ND or <QL	0.171	J	0.171	J	ND or <QL	1.36	J	1.36	J	ND or <QL
08A-0082-C2BS	11.4	J	11.4	J	ND or <QL	6.05	J	6.05	J	ND or <QL	9.1	J	9.1	J	ND or <QL	0.314	J	0.314	J	ND or <QL	1.79	J	1.79	J	ND or <QL
08A-0082-C2CS	19.1	J	19.1	J	ND or <QL	9.47	J	9.47	J	ND or <QL	11	J	11	J	ND or <QL	1.63	J	1.63	J	ND or <QL	2.91	J	2.91	J	ND or <QL
08A-0082-C2DS	8.66	J	8.66	J	ND or <QL	3.81	J	3.81	J	ND or <QL	5.49	J	5.49	J	ND or <QL	< 0.296	U	< 0.296	U	ND or <QL	1.33	J	1.33	J	ND or <QL
08A-0082-C2ES	24.9		36.1	F	*1.450	14.5	J	14.5	J	ND or <QL	12.5	J	12.5	J	ND or <QL	< 0.484	U	< 0.484	U	ND or <QL	2.43	J	2.43	J	ND or <QL
08A-0082-C2FS	25.9		37.5	F	*1.448	12.1	J	12.1	J	ND or <QL	13.5	J	13.5	J	ND or <QL	0.374	J	0.374	J	ND or <QL	3.28	J	3.28	J	ND or <QL
08A-0082-C2FT	30.2		43.8	F	*1.450	11.8	J	11.8	J	ND or <QL	14.7	J	14.7	J	ND or <QL	0.508	J	0.508	J	ND or <QL	3.51	J	3.51	J	ND or <QL
08A-0082-C2GS	30		43.5	F	*1.450	11.8	J	11.8	J	ND or <QL	13	J	13	J	ND or <QL	< 0.502	U	< 0.502	U	ND or <QL	3.69	J	3.69	J	ND or <QL
08A-0082-C2HS	63.6		92.2	F	*1.450	21	J	21	J	ND or <QL	24.2	J	24.2	J	ND or <QL	0.86	J	0.86	J	ND or <QL	4.57	J	4.57	J	ND or <QL
08A-0082-C2IS	52.2		75.6	F	*1.448	23.5	J	23.5	J	ND or <QL	20.8	J	20.8	J	ND or <QL	0.806	J	0.806	J	ND or <QL	4.04	J	4.04	J	ND or <QL
08A-0082-C2JS	31.9		46.2	F	*1.448	16.5	J	16.5	J	ND or <QL	15.5	J	15.5	J	ND or <QL	< 0.519	U	< 0.519	U	ND or <QL	5	J	5	J	ND or <QL
08A-0082-C2KS	14.3	J	14.3	J	ND or <QL	7.13	J	7.13	J	ND or <QL	7.19	J	7.19	J	ND or <QL	< 0.494	U	< 0.494	U	ND or <QL	1.82	J	1.82	J	ND or <QL
08A-0083-C2AS	2.24	J	2.24	J	ND or <QL	< 1.25	U	< 1.25	U	ND or <QL	< 1.57	UJ	< 1.57	UJ	ND or <QL	< 0.0830	U	< 0.0830	U	ND or <QL	0.547	J	0.547	J	ND or <QL
08A-0083-C2BS	2.42	J	2.42	J	ND or <QL	1.17	J	1.17	J	ND or <QL	1.8	J	1.8	J	ND or <QL	0.0953	J	0.0953	J	ND or <QL	0.467	J	0.467	J	ND or <QL
08A-0083-C2CS	1.41	J	1.41	J	ND or <QL	0.921	J	0.921	J	ND or <QL	1.04	J	1.04	J	ND or <QL	< 0.113	U	< 0.113	U	ND or <QL	0.368	J	0.368	J	ND or <QL
08A-0083-C2DS	3.3	J	3.3	J	ND or <QL	2.63	J	2.63	J	ND or <QL	2.85	J	2.85	J	ND or <QL	0.132	J	0.132	J	ND or <QL	0.88	J	0.88	J	ND or <QL
08A-0083-C2ES	1.53	J	1.53	J	ND or <QL	1.49	J	1.49	J	ND or <QL	1.18	J	1.18	J	ND or <QL	< 0.0832	U	< 0.0832	U	ND or <QL	0.374	J	0.374	J	ND or <QL
08A-0084-C1AS	2.01	J	2.01	J	ND or <QL	1.43	J	1.43	J	ND or <QL	0.922	J	0.922	J	ND or <QL	< 0.194	U	< 0.194	U	ND or <QL	< 0.270	U	< 0.270	U	ND or <QL
08A-0084-C1BS	0.797	J	0.797	J	ND or <QL	0.615	J	0.615	J	ND or <QL	0.648	J	0.648	J	ND or <QL	< 0.246	U	< 0.246	U	ND or <QL	< 0.268	U	< 0.268	U	ND or <QL
08A-0084-C1BT	1.95	J	1.95	J	ND or <QL	0.898	J	0.898	J	ND or <QL	< 0.262	U	< 0.262	U	ND or <QL	< 0.250	U	< 0.250	U	ND or <QL	< 0.422	U	< 0.422	U	ND or <QL
08A-0084-C1CS	55.7	J	80.7	JF	*1.449	21.5	J	21.5	J	ND or <QL	24.2	J	24.2	J	ND or <QL	1	J	1	J	ND or <QL	5.36	J	5.36	J	ND or <QL
08A-0084-C1DS	38.3		55.5	F	*1.449	18.4	J	18.4	J	ND or <QL	16.5	J	16.5	J	ND or <QL	< 0.688	U	< 0.688	U	ND or <QL	4.67	J	4.67	J	ND or <QL
08A-0084-C1ES	56.2		53.1	BD	Split-Replaced																				

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,6,7,8-HxCDD 57653-85-7 ng/kg					1,2,3,6,7,8-HxCDF 57117-44-9 ng/kg					1,2,3,7,8,9-HxCDD 19408-74-3 ng/kg					1,2,3,7,8,9-HxCDF 72918-21-9 ng/kg					1,2,3,7,8-PeCDD 40321-76-4 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0086-C3CS	0.106	J	0.106	J	ND or <QL	< 0.430	U	< 0.430	U	ND or <QL	< 0.0549	U	< 0.0549	U	ND or <QL	0.0392	J	0.0392	J	ND or <QL	< 0.0495	U	< 0.0495	U	ND or <QL
08A-0086-C3DS	< 0.155	U	< 0.155	U	ND or <QL	< 0.0789	U	< 0.0789	U	ND or <QL	< 0.109	U	< 0.109	U	ND or <QL	< 0.0888	U	< 0.0888	U	ND or <QL	< 0.116	U	< 0.116	U	ND or <QL
08A-0086-C3ES	< 0.108	U	< 0.108	U	ND or <QL	< 0.0392	U	< 0.0392	U	ND or <QL	< 0.0775	U	< 0.0775	U	ND or <QL	< 0.0453	U	< 0.0453	U	ND or <QL	< 0.403	U	< 0.403	U	ND or <QL
08A-0087-C3AS	< 0.748	U	< 0.748	U	ND or <QL	< 0.374	U	< 0.374	U	ND or <QL	< 0.547	UJ	< 0.547	UJ	ND or <QL	< 0.0786	U	< 0.0786	U	ND or <QL	0.142	J	0.142	J	ND or <QL
08A-0087-C3BS	< 0.0838	U	< 0.0838	U	ND or <QL	< 0.0428	U	< 0.0428	U	ND or <QL	< 0.0583	U	< 0.0583	U	ND or <QL	< 0.0516	U	< 0.0516	U	ND or <QL	< 0.374	U	< 0.374	U	ND or <QL
08A-0087-C3CS	< 0.186	U	< 0.186	U	ND or <QL	< 0.0746	U	< 0.0746	U	ND or <QL	< 0.124	U	< 0.124	U	ND or <QL	< 0.107	U	< 0.107	U	ND or <QL	< 1.24	U	< 1.24	U	ND or <QL
08A-0087-C3DS	< 0.0820	U	< 0.0820	U	ND or <QL	< 0.0309	U	< 0.0309	U	ND or <QL	< 0.0519	U	< 0.0519	U	ND or <QL	< 0.0368	U	< 0.0368	U	ND or <QL	< 0.594	U	< 0.594	U	ND or <QL
08A-0088-C1AS	0.343	J	0.343	J	ND or <QL	0.188	J	0.188	J	ND or <QL	0.297	J	0.297	J	ND or <QL	< 0.0376	U	< 0.0376	U	ND or <QL	< 0.123	U	< 0.123	U	ND or <QL
08A-0088-C1BS	< 0.0522	U	< 0.0522	U	ND or <QL	< 0.0366	U	< 0.0366	U	ND or <QL	< 0.0419	U	< 0.0419	U	ND or <QL	< 0.0374	U	< 0.0374	U	ND or <QL	< 0.0456	U	< 0.0456	U	ND or <QL
08A-0088-C1CS	< 0.132	U	< 0.132	U	ND or <QL	< 0.0718	U	< 0.0718	U	ND or <QL	< 0.106	U	< 0.106	U	ND or <QL	< 0.0850	U	< 0.0850	U	ND or <QL	< 0.0973	U	< 0.0973	U	ND or <QL
08A-0089-C2AS	4.52	J	4.52	J	ND or <QL	1.55	J	1.55	J	ND or <QL	2.8	J	2.8	J	ND or <QL	< 0.0863	U	< 0.0863	U	ND or <QL	0.704	J	0.704	J	ND or <QL
08A-0089-C2BS	1.72	J	2.56	EZ	Split-Replaced	0.87	J	2.06	BJ	Split-Replaced	1.66	J	2.05	J	Split-Replaced	< 0.0588	U	< 0.295	U	Split-Replaced	0.397	J	< 0.632	U	Split-Replaced
08A-0089-C2CS	1.95	J	5.44	BJ	Split-Replaced	0.912	J	1.77	BJ	Split-Replaced	1.65	J	5.34	J	Split-Replaced	< 0.102	U	< 0.267	U	Split-Replaced	0.39	J	1.84	BJ	Split-Replaced
08A-0089-C2DS	< 1.38	U	< 1.38	U	ND or <QL	< 1.02	U	< 1.02	U	ND or <QL	< 1.15	U	< 1.15	U	ND or <QL	< 0.0696	U	< 0.0696	U	ND or <QL	0.464	J	0.464	J	ND or <QL
08A-0089-C2ES	< 1.36	U	< 1.36	U	ND or <QL	< 0.687	UJ	< 0.687	UJ	ND or <QL	< 0.678	U	< 0.678	U	ND or <QL	< 0.185	U	< 0.185	U	ND or <QL	0.343	J	0.343	J	ND or <QL
08A-0090-C5AS	1.75	J	1.75	J	ND or <QL	1.84	J	1.84	J	ND or <QL	1.03	J	1.03	J	ND or <QL	< 0.132	U	< 0.132	U	ND or <QL	0.344	J	0.344	J	ND or <QL
08A-0090-C5BS	< 0.265	U	< 0.265	U	ND or <QL	< 0.723	U	< 0.723	U	ND or <QL	< 0.174	UJ	< 0.174	UJ	ND or <QL	< 0.0823	U	< 0.0823	U	ND or <QL	< 0.100	U	< 0.100	U	ND or <QL
08A-0092-C1AS	4.27	J	4.27	J	ND or <QL	1.07	J	1.07	J	ND or <QL	4	J	4	J	ND or <QL	0.771	J	0.771	J	ND or <QL	0.477	J	0.477	J	ND or <QL
08A-0096-C3AS	3.59	J	3.59	J	ND or <QL	2.17	J	2.17	J	ND or <QL	2.6	J	2.6	J	ND or <QL	< 0.139	U	< 0.139	U	ND or <QL	0.58	J	0.58	J	ND or <QL
08A-0096-C3BS	8.6	J	8.6	J	ND or <QL	5.71	J	5.71	J	ND or <QL	4.68	J	4.68	J	ND or <QL	0.191	J	0.191	J	ND or <QL	1.32	J	1.32	J	ND or <QL
08A-0098-C1AS	12.6	J	12.6	J	ND or <QL	9.61	J	9.61	J	ND or <QL	5.38	J	5.38	J	ND or <QL	< 0.480	U	< 0.480	U	ND or <QL	1.23	J	1.23	J	ND or <QL
08A-0098-C1BS	12.4	J	12.4	J	ND or <QL	6.87	J	6.87	J	ND or <QL	3.9	J	3.9	J	ND or <QL	< 0.175	U	< 0.175	U	ND or <QL	1.34	J	1.34	J	ND or <QL
08A-0098-C1CS	24.5	J	24.5	J	ND or <QL	56.6	J	69.9	JF	*1.235	9.62	J	9.62	J	ND or <QL	2.34	J	2.34	J	ND or <QL	3.83	J	3.83	J	ND or <QL
08A-0098-C1DS	< 1.02	UJ	< 1.02	UJ	ND or <QL	11.3	J	11.3	J	ND or <QL	< 0.933	UJ	< 0.933	UJ	ND or <QL	< 0.600	UJ	< 0.600	UJ	ND or <QL	0.551	J	0.551	J	ND or <QL
08A-0098-C1ES	1.53	J	1.76	BJ	Split-Replaced	5.55	J	5.66	BJ	Split-Replaced	< 0.902	UJ	2.49	EZ	Split-Replaced	< 0.793	UJ	< 1.14	U	Split-Replaced	1.11	J	< 1.12	U	Split-Replaced
08A-0098-C1FS	1.66	J	1.85	BJ	Split-Replaced	11.6	J	10.3	B	Split-Replaced	1.49	J	2.83	J	Split-Replaced	< 1.13	UJ	1.57	BJ	Split-Replaced	1.4	J	< 1.00	U	Split-Replaced
08A-0098-C1GS	1.94	J	1.94	J	ND or <QL	13.7	J	13.7	J	ND or <QL	2.25	J	2.25	J	ND or <QL	1.36	J	1.36	J	ND or <QL	0.913	J	0.913	J	ND or <QL
08A-0099-C1AS	2.07	J	2.07	J	ND or <QL	< 1.52	U	< 1.52	U	ND or <QL	1.22	J	1.22	J	ND or <QL	< 0.0824	U	< 0.0824	U	ND or <QL	0.424	J	0.424	J	ND or <QL
08A-0099-C1BS	9.78	J	9.78	J	ND or <QL	5.42	J	5.42	J	ND or <QL	6.2	J	6.2	J	ND or <QL	< 0.294	UJ	< 0.294	UJ	ND or <QL	1.63	J	1.63	J	ND or <QL
08A-0099-C1CS	46.9	J	68	JF	*1.450	16.9	J	16.9	J	ND or <QL	31	J	31	J	ND or <QL	< 0.590	UJ	< 0.590	UJ	ND or <QL	4.95	J	4.95	J	ND or <QL
08A-0099-C1DS	25.7	J	25.7	J	ND or <QL	17.7	J	17.7	J	ND or <QL	18.7	J	18.7	J	ND or <QL	< 0.746	UJ	< 0.746	UJ	ND or <QL	4.45	J	4.45	J	ND or <QL
08A-0099-C1ES	41.2		59.7	F	*1.449	19.9	J	19.9	J	ND or <QL	19.4	J	19.4	J	ND or <QL	< 0.868	UJ	< 0.868	UJ	ND or <QL	4.76	J	4.76	J	ND or <QL
08A-0099-C1FS	< 1.03	UJ	< 1.03	UJ	ND or <QL	4.47	J	4.47	J	ND or <QL	1.64	J	1.64	J	ND or <QL	< 0.574	U	< 0.574	U	ND or <QL	0.469	J	0.469	J	ND or <QL
08A-0100-C1AS	1.71	J	1.71	J	ND or <QL	< 1.20	UJ	< 1.20	UJ	ND or <QL	1.19	J	1.19	J	ND or <QL	< 0.130	U	< 0.130	U	ND or <QL	< 0.253	U	&		

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,6,7,8-HxCDD 57653-85-7 ng/kg					1,2,3,6,7,8-HxCDF 57117-44-9 ng/kg					1,2,3,7,8,9-HxCDD 19408-74-3 ng/kg					1,2,3,7,8,9-HxCDF 72918-21-9 ng/kg					1,2,3,7,8-PeCDD 40321-76-4 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0104-C1DS	< 0.581	UJ	< 0.581	UJ	ND or <QL	< 1.46	UJ	< 1.46	UJ	ND or <QL	< 0.420	UJ	< 0.420	UJ	ND or <QL	< 0.477	UJ	< 0.477	UJ	ND or <QL	< 0.183	UJ	< 0.183	UJ	ND or <QL
08A-0104-C1ES	< 1.14	UJ	< 1.14	UJ	ND or <QL	< 2.56	UJ	< 2.56	UJ	ND or <QL	< 0.227	UJ	< 0.227	UJ	ND or <QL	< 0.302	UJ	< 0.302	UJ	ND or <QL	0.399	J	0.399	J	ND or <QL
08A-0104-C1FS	1.13	J	1.13	J	ND or <QL	< 4.13	U	< 4.13	U	ND or <QL	0.911	J	0.911	J	ND or <QL	< 0.255	UJ	< 0.255	UJ	ND or <QL	0.635	J	0.635	J	ND or <QL
08A-0104-C1FT	< 0.436	UJ	< 0.436	UJ	ND or <QL	< 2.16	UJ	< 2.16	UJ	ND or <QL	< 0.440	UJ	< 0.440	UJ	ND or <QL	< 0.302	UJ	< 0.302	UJ	ND or <QL	0.392	J	0.392	J	ND or <QL
08A-0104-C1GS	< 0.506	UJ	< 0.506	UJ	ND or <QL	< 2.69	UJ	< 2.69	UJ	ND or <QL	< 0.536	UJ	< 0.536	UJ	ND or <QL	< 0.295	UJ	< 0.295	UJ	ND or <QL	0.316	J	0.316	J	ND or <QL
08A-0106-C1AS	0.549	J	0.549	J	ND or <QL	0.519	J	0.519	J	ND or <QL	0.568	J	0.568	J	ND or <QL	< 0.0380	U	< 0.0380	U	ND or <QL	0.172	J	0.172	J	ND or <QL
08A-0107-C2AS	0.898	J	0.898	J	ND or <QL	0.572	J	0.572	J	ND or <QL	0.679	J	0.679	J	ND or <QL	< 0.146	U	< 0.146	U	ND or <QL	0.54	J	0.54	J	ND or <QL
08A-0108-C1AS	3.89	J	3.89	J	ND or <QL	2.13	J	2.13	J	ND or <QL	2.47	J	2.47	J	ND or <QL	0.266	J	0.266	J	ND or <QL	0.834	J	0.834	J	ND or <QL
08A-0108-C1BS	2.7	J	2.7	J	ND or <QL	2.4	J	2.4	J	ND or <QL	2.2	J	2.2	J	ND or <QL	0.899	J	0.899	J	ND or <QL	1.56	J	1.56	J	ND or <QL
08A-0109-C3AS	1.51	J	1.51	J	ND or <QL	< 0.111	UJ	< 0.111	UJ	ND or <QL	1.69	J	1.69	J	ND or <QL	< 0.120	UJ	< 0.120	UJ	ND or <QL	< 0.0849	UJ	< 0.0849	UJ	ND or <QL
08A-0109-C3BS	< 0.216	U	< 0.216	U	ND or <QL	< 0.0801	U	< 0.0801	U	ND or <QL	< 0.179	U	< 0.179	U	ND or <QL	< 0.0840	U	< 0.0840	U	ND or <QL	< 0.101	U	< 0.101	U	ND or <QL
08A-0109-C3CS	0.46	J	0.46	J	ND or <QL	< 0.137	U	< 0.137	U	ND or <QL	0.834	J	0.834	J	ND or <QL	< 0.148	U	< 0.148	U	ND or <QL	< 0.0352	U	< 0.0352	U	ND or <QL
08A-0109-C3DS	0.255	J	0.255	J	ND or <QL	< 0.0672	U	< 0.0672	U	ND or <QL	0.552	J	0.552	J	ND or <QL	< 0.0744	U	< 0.0744	U	ND or <QL	< 0.0496	U	< 0.0496	U	ND or <QL
08A-0109-C3ES	< 0.0904	U	< 0.0904	U	ND or <QL	< 0.0620	U	< 0.0620	U	ND or <QL	< 0.0727	U	< 0.0727	U	ND or <QL	< 0.0648	U	< 0.0648	U	ND or <QL	< 0.0793	U	< 0.0793	U	ND or <QL
08A-0109-C3ET	< 0.140	U	< 0.140	U	ND or <QL	< 0.0865	U	< 0.0865	U	ND or <QL	< 0.115	U	< 0.115	U	ND or <QL	< 0.0869	U	< 0.0869	U	ND or <QL	< 0.106	U	< 0.106	U	ND or <QL
08A-0110-C1AS	10.6	J	10.6	J	ND or <QL	7.27	J	7.27	J	ND or <QL	7.76	J	7.76	J	ND or <QL	< 0.516	U	< 0.516	U	ND or <QL	2.65	J	2.65	J	ND or <QL
08A-0110-C1BS	3.86	J	3.86	J	ND or <QL	3.24	J	3.24	J	ND or <QL	2.94	J	2.94	J	ND or <QL	< 0.511	U	< 0.511	U	ND or <QL	< 0.206	U	< 0.206	U	ND or <QL
08A-0110-C1CS	12.7	J	12.7	J	ND or <QL	13	J	13	J	ND or <QL	10.1	J	10.1	J	ND or <QL	< 0.761	U	< 0.761	U	ND or <QL	2.44	J	2.44	J	ND or <QL
08A-0110-C1DS	< 0.374	UJ	< 0.374	UJ	ND or <QL	< 0.361	UJ	< 0.361	UJ	ND or <QL	< 0.333	UJ	< 0.333	UJ	ND or <QL	< 0.433	UJ	< 0.433	UJ	ND or <QL	< 0.470	UJ	< 0.470	UJ	ND or <QL
08A-0110-C1ES	< 0.317	U	< 0.317	U	ND or <QL	< 0.293	U	< 0.293	U	ND or <QL	< 0.284	U	< 0.284	U	ND or <QL	< 0.322	U	< 0.322	U	ND or <QL	< 0.290	U	< 0.290	U	ND or <QL
08A-0110-C1FS	< 0.110	U	< 0.110	U	ND or <QL	< 0.151	U	< 0.151	U	ND or <QL	< 0.0977	U	< 0.0977	U	ND or <QL	< 0.178	U	< 0.178	U	ND or <QL	< 0.102	U	< 0.102	U	ND or <QL
08A-0110-C1GS	< 0.170	U	< 0.170	U	ND or <QL	< 0.137	U	< 0.137	U	ND or <QL	< 0.149	U	< 0.149	U	ND or <QL	< 0.169	U	< 0.169	U	ND or <QL	< 0.128	U	< 0.128	U	ND or <QL
08A-0111-C1AS	0.467	J	0.467	J	ND or <QL	0.203	J	0.203	J	ND or <QL	0.211	J	0.211	J	ND or <QL	0.0502	J	0.0502	J	ND or <QL	< 0.0925	U	< 0.0925	U	ND or <QL
08A-0111-C1BS	1.51	J	1.51	J	ND or <QL	0.423	J	0.423	J	ND or <QL	1.28	J	1.28	J	ND or <QL	< 0.0849	U	< 0.0849	U	ND or <QL	0.353	J	0.353	J	ND or <QL
08A-0111-C1CS	13.9	J	13.9	J	ND or <QL	6.45	J	6.45	J	ND or <QL	8.14	J	8.14	J	ND or <QL	< 0.264	UJ	< 0.264	UJ	ND or <QL	1.37	J	1.37	J	ND or <QL
08A-0111-C1DS	< 1.55	U	< 1.55	U	ND or <QL	< 1.31	U	< 1.31	U	ND or <QL	< 1.16	UJ	< 1.16	UJ	ND or <QL	< 0.0922	U	< 0.0922	U	ND or <QL	0.316	J	0.316	J	ND or <QL
08A-0112-C2AS	< 1.61	UJ	< 1.61	UJ	ND or <QL	< 0.717	U	< 0.717	U	ND or <QL	< 0.949	U	< 0.949	U	ND or <QL	< 0.0795	U	< 0.0795	U	ND or <QL	0.375	J	0.375	J	ND or <QL
08A-0112-C2BS	< 3.57	U	< 3.57	U	ND or <QL	< 1.60	U	< 1.60	U	ND or <QL	1.8	J	1.8	J	ND or <QL	< 0.120	U	< 0.120	U	ND or <QL	0.539	J	0.539	J	ND or <QL
08A-0112-C2CS	1.73	J	1.73	J	ND or <QL	1.19	J	1.19	J	ND or <QL	1.35	J	1.35	J	ND or <QL	0.0556	J	0.0556	J	ND or <QL	0.456	J	0.456	J	ND or <QL
08A-0112-C2DS	0.925	J	0.925	J	ND or <QL	0.672	J	0.672	J	ND or <QL	0.387	J	0.387	J	ND or <QL	0.0659	J	0.0659	J	ND or <QL	0.137	J	0.137	J	ND or <QL
08A-0113-C1AS	2.87	J	2.87	J	ND or <QL	< 1.14	U	< 1.14	U	ND or <QL	1.98	J	1.98	J	ND or <QL	< 0.113	U	< 0.113	U	ND or <QL	0.426	J	0.426	J	ND or <QL
08A-0113-C1BS	5.83	J	5.83	J	ND or <QL	2.99	J	2.99	J	ND or <QL	3.44	J	3.44	J	ND or <QL	< 0.114	U	< 0.114	U	ND or <QL	0.895	J	0.895	J	ND or <QL
08A-0113-C1CS	5.41	J	5.41	J	ND or <QL	< 2.02	UJ	< 2.02	UJ	ND or <QL	4.27	J	4.27	J	ND or <QL	< 0.182	UJ	< 0.182	UJ	ND or <QL	0.942	J	0.942	J	ND or <QL
08A-0114-C2AS	13</																								

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,6,7,8-HxCDD 57653-85-7 ng/kg					1,2,3,6,7,8-HxCDF 57117-44-9 ng/kg					1,2,3,7,8,9-HxCDD 19408-74-3 ng/kg					1,2,3,7,8,9-HxCDF 72918-21-9 ng/kg					1,2,3,7,8-PeCDD 40321-76-4 ng/kg				
	Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted			Original		Adjusted		
	Result	Qual	Result	Qual	Adjustment†	Result	Qual	Result	Qual	Adjustment†	Result	Qual	Result	Qual	Adjustment†	Result	Qual	Result	Qual	Adjustment†	Result	Qual	Result	Qual	Adjustment†
08A-0118-C5AS	1.8	J	1.8	J	ND or <QL	< 0.809	U	< 0.809	U	ND or <QL	< 1.34	U	< 1.34	U	ND or <QL	< 0.0969	U	< 0.0969	U	ND or <QL	0.436	J	0.436	J	ND or <QL
08A-0118-C5CS	< 0.138	U	< 0.138	U	ND or <QL	< 0.0524	U	< 0.0524	U	ND or <QL	< 0.117	U	< 0.117	U	ND or <QL	< 0.0705	U	< 0.0705	U	ND or <QL	< 0.128	U	< 0.128	U	ND or <QL
08A-1070-C2AS	1.3	J	1.3	J	ND or <QL	3.26	J	3.26	J	ND or <QL	0.933	J	0.933	J	ND or <QL	< 0.760	UJ	< 0.760	UJ	ND or <QL	0.616	J	0.616	J	ND or <QL

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,7,8-PeCDF 57117-41-6 ng/kg					2,3,4,6,7,8-HxCDF 60851-34-5 ng/kg					2,3,4,7,8-PeCDF 57117-31-4 ng/kg					2,3,7,8-TCDD 1746-01-6 ng/kg					2,3,7,8-TCDF 51207-31-9 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0001-C1AS	8.3	J	8.3	J	ND or <QL	22.9	J	22.9	J	ND or <QL	35.7	J	48.9	JF	*1.370	51.9	J	97.9	JF	*1.886	11	J	15.5	JF	*1.409
08A-0001-C1BS	< 2.59	UJ	< 2.59	UJ	ND or <QL	< 3.94	UJ	< 3.94	UJ	ND or <QL	4.75	J	4.75	J	ND or <QL	18.1	J	34.2	JF	*1.890	4.16	J	5.86	JF	*1.409
08A-0001-C1CS	7.62	J	7.62	J	ND or <QL	12.7	J	12.7	J	ND or <QL	16.1	J	16.1	J	ND or <QL	65.4	J	123	JF	*1.881	11	J	15.5	JF	*1.409
08A-0001-C1DS	14.4	J	14.4	J	ND or <QL	22.3	J	22.3	J	ND or <QL	24.7	J	24.7	J	ND or <QL	163	J	308	JF	*1.890	21.6	J	30.4	JF	*1.407
08A-0001-C1ES	10.8	J	10.8	J	ND or <QL	15.1	J	15.1	J	ND or <QL	19.3	J	19.3	J	ND or <QL	75.6	J	143	JF	*1.892	13.8	J	19.4	JF	*1.406
08A-0001-C1FS	1.45	J	1.45	J	ND or <QL	< 2.27	UJ	< 2.27	UJ	ND or <QL	2.75	J	2.75	J	ND or <QL	14.2	J	26.8	JF	*1.887	2.14	J	2.14	J	ND or <QL
08A-0001-C1FT	11.8	J	11.8	J	ND or <QL	18.5	J	18.5	J	ND or <QL	23	J	23	J	ND or <QL	86.4	J	163	JF	*1.887	18.1	J	25.5	JF	*1.409
08A-0001-C1GS	12	J	12	J	ND or <QL	20.2	J	20.2	J	ND or <QL	23.5	J	23.5	J	ND or <QL	88.5		167	F	*1.887	19.5		27.5	F	*1.410
08A-0001-C1HS	13.1	J	13.1	J	ND or <QL	17.7	J	17.7	J	ND or <QL	21.2	J	21.2	J	ND or <QL	100		189	F	*1.890	20.2		28.4	F	*1.406
08A-0001-C1IS	16.3	J	16.3	J	ND or <QL	21.3	J	21.3	J	ND or <QL	25.6	J	25.6	J	ND or <QL	98.1		185	F	*1.886	22.6		31.8	F	*1.407
08A-0001-C1JS	11.9	J	11.9	J	ND or <QL	16.2	J	16.2	J	ND or <QL	17.5	J	17.5	J	ND or <QL	213		402	F	*1.887	23		32.4	F	*1.409
08A-0001-C1KS	15.9	J	15.9	J	ND or <QL	21.8	J	21.8	J	ND or <QL	25	J	25	J	ND or <QL	124		234	F	*1.887	24.8		34.9	F	*1.407
08A-0002-C1AS	0.451	J	0.451	J	ND or <QL	< 0.369	UJ	< 0.369	UJ	ND or <QL	< 0.573	UJ	< 0.573	UJ	ND or <QL	< 0.833	UJ	< 0.833	UJ	ND or <QL	< 0.677	UJ	< 0.677	UJ	ND or <QL
08A-0002-C1BS	0.42	J	0.42	J	ND or <QL	< 0.226	UJ	< 0.226	UJ	ND or <QL	< 0.485	UJ	< 0.485	UJ	ND or <QL	< 0.297	UJ	< 0.297	UJ	ND or <QL	< 1.13	UJ	< 1.13	UJ	ND or <QL
08A-0002-C1CS	1.04	J	1.04	J	ND or <QL	< 0.633	U	< 0.633	U	ND or <QL	< 0.937	U	< 0.937	U	ND or <QL	< 0.244	UJ	< 0.244	UJ	ND or <QL	< 2.16	UJ	< 2.16	UJ	ND or <QL
08A-0002-C1DS	< 0.0215	U	< 0.0215	U	ND or <QL	< 0.0266	U	< 0.0266	U	ND or <QL	< 0.0203	U	< 0.0203	U	ND or <QL	< 0.0414	U	< 0.0414	U	ND or <QL	< 0.325	U	< 0.325	U	ND or <QL
08A-0002-C1ES	< 0.0292	U	< 0.201	U	Split-Replaced	< 0.0313	U	< 0.192	U	Split-Replaced	< 0.0266	U	< 0.246	U	Split-Replaced	< 0.0450	U	< 0.204	U	Split-Replaced	< 0.359	U	< 0.135	U	Split-Replaced
08A-0002-C1FS	< 0.0245	U	< 0.144	U	Split-Replaced	< 0.0320	U	< 0.348	U	Split-Replaced	< 0.0228	U	< 0.279	U	Split-Replaced	< 0.0510	U	< 0.209	U	Split-Replaced	< 0.351	U	0.257	J	Split-Replaced
08A-0003-C1AS	21.4	J	21.4	J	ND or <QL	23.5	J	23.5	J	ND or <QL	32	J	43.8	JF	*1.369	325	J	613	JF	*1.886	26.4	J	37.2	JF	*1.409
08A-0003-C1BS	7.19	J	7.19	J	ND or <QL	8.33	J	8.33	J	ND or <QL	10.2	J	10.2	J	ND or <QL	539	J	1020	JF	*1.892	8.61	J	12.1	JF	*1.405
08A-0003-C1CS	1.94	J	1.94	J	ND or <QL	3.87	J	3.87	J	ND or <QL	3.11	J	3.11	J	ND or <QL	< 0.758	UJ	< 0.758	UJ	ND or <QL	< 4.02	UJ	< 4.02	UJ	ND or <QL
08A-0003-C1DS	< 0.359	U	< 0.359	U	ND or <QL	< 0.425	U	< 0.425	U	ND or <QL	< 0.362	U	< 0.362	U	ND or <QL	< 0.645	U	< 0.645	U	ND or <QL	< 2.06	UJ	< 2.06	UJ	ND or <QL
08A-0003-C1ES	1.56	J	1.56	J	ND or <QL	< 1.36	U	< 1.36	U	ND or <QL	1.69	J	1.69	J	ND or <QL	0.8	J	0.8	J	ND or <QL	4.43		6.24	F	*1.409
08A-0003-C1FS	< 0.0389	U	< 0.0389	U	ND or <QL	< 0.0393	U	< 0.0393	U	ND or <QL	0.142	J	0.142	J	ND or <QL	< 0.0707	U	< 0.0707	U	ND or <QL	< 0.397	U	< 0.397	U	ND or <QL
08A-0003-C1GS	< 0.0521	U	< 0.0521	U	ND or <QL	< 0.0523	U	< 0.0523	U	ND or <QL	< 0.0469	U	< 0.0469	U	ND or <QL	< 0.0903	U	< 0.0903	U	ND or <QL	< 0.115	U	< 0.115	U	ND or <QL
08A-0003-C1HS	< 0.0540	U	< 0.0540	U	ND or <QL	< 0.0317	U	< 0.0317	U	ND or <QL	< 0.0496	U	< 0.0496	U	ND or <QL	< 0.0773	U	< 0.0773	U	ND or <QL	< 0.0730	U	< 0.0730	U	ND or <QL
08A-0004-C1AS	9.64	J	9.64	J	ND or <QL	18.5	J	18.5	J	ND or <QL	22.8	J	22.8	J	ND or <QL	111	J	209	JF	*1.883	16.7	J	23.5	JF	*1.407
08A-0004-C1BS	10.3	J	10.3	J	ND or <QL	15.8	J	15.8	J	ND or <QL	18.5	J	18.5	J	ND or <QL	102	J	192	JF	*1.882	16.9	J	23.8	JF	*1.408
08A-0004-C1CS	11.3	J	11.3	J	ND or <QL	22.9	J	22.9	J	ND or <QL	29.4	J	29.4	J	ND or <QL	81.2	J	153	JF	*1.884	16.7	J	23.5	JF	*1.407
08A-0004-C1DS	10.1	J	10.1	J	ND or <QL	15.6	J	15.6	J	ND or <QL	18.9	J	18.9	J	ND or <QL	70	J	132	JF	*1.886	16.2	J	22.8	JF	*1.407
08A-0004-C1ES	1.42	J	1.42	J	ND or <QL	1.75	J	1.75	J	ND or <QL	2.81	J	2.81	J	ND or <QL	11.3	J	21.3	JF	*1.885	< 2.42	UJ	< 2.42	UJ	ND or <QL
08A-0004-C1FS	< 0.972	UJ	< 0.972	UJ	ND or <QL	1.33	J	1.33	J	ND or <QL	< 1.55	UJ	< 1.55	UJ	ND or <QL	8.45	J	15.9	JF	*1.882	< 2.34	UJ	< 2.34	UJ	ND or <QL
08A-0004-C1FT	15.6	J	15.6	J	ND or <QL	21.2	J	21.2	J	ND or <QL	22.7	J	31.1	JF	*1.370	139	J	262	JF	*1.885	23.5	J	33.1	JF	*1.409
08A-0004-C1GS	< 0.110	U	< 0.110	U	ND or <QL	0.755	J	0.755	J	ND or <QL	< 1.03	UJ	< 1.03	UJ	ND or <QL	6.27		11.8	F	*1.882	1.19	J	1.19	J	ND or <QL
08A-0004-C1HS	10.9	J	10.9	J	ND or <QL	15.9	J	15.9	J	ND or <QL	18.1	J	18.1	J	ND or <QL	169									

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,7,8-PeCDF 57117-41-6 ng/kg					2,3,4,6,7,8-HxCDF 60851-34-5 ng/kg					2,3,4,7,8-PeCDF 57117-31-4 ng/kg					2,3,7,8-TCDD 1746-01-6 ng/kg					2,3,7,8-TCDF 51207-31-9 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0006-C1ES	0.72	J	0.72	J	ND or <QL	0.892	J	0.892	J	ND or <QL	< 0.888	U	< 0.888	U	ND or <QL	7.65		14.4	F	*1.882	< 1.83	UJ	< 1.83	UJ	ND or <QL
08A-0006-C1FS	< 0.138	U	< 0.138	U	ND or <QL	< 0.0933	U	< 0.0933	U	ND or <QL	< 0.116	U	< 0.116	U	ND or <QL	< 0.310	U	< 0.310	U	ND or <QL	< 0.277	U	< 0.277	U	ND or <QL
08A-0006-C1GS	0.763	J	0.763	J	ND or <QL	0.791	J	0.791	J	ND or <QL	1.29	J	1.29	J	ND or <QL	13.9	J	26.2	JF	*1.885	1.23	J	1.23	J	ND or <QL
08A-0006-C1HS	0.519	J	0.519	J	ND or <QL	0.655	J	0.655	J	ND or <QL	0.889	J	0.889	J	ND or <QL	13.9		26.2	F	*1.885	< 1.70	U	< 1.70	U	ND or <QL
08A-0006-C1IS	< 0.125	U	< 0.125	U	ND or <QL	0.668	J	0.668	J	ND or <QL	0.893	J	0.893	J	ND or <QL	19.1		36	F	*1.885	< 1.19	U	< 1.19	U	ND or <QL
08A-0006-C1JS	< 0.121	U	< 0.121	U	ND or <QL	0.201	J	0.201	J	ND or <QL	< 0.113	U	< 0.113	U	ND or <QL	7.42		14	F	*1.887	< 1.10	U	< 1.10	U	ND or <QL
08A-0006-C1KS	< 0.0877	U	< 0.0877	U	ND or <QL	0.519	J	0.519	J	ND or <QL	0.648	J	0.648	J	ND or <QL	13.1		24.7	F	*1.885	< 1.17	U	< 1.17	U	ND or <QL
08A-0007-C2AS	7.28	J	7.28	J	ND or <QL	11.9	J	11.9	J	ND or <QL	14.1	J	14.1	J	ND or <QL	133	J	251	JF	*1.887	12.2	J	17.2	JF	*1.410
08A-0007-C2BS	11.3	J	11.3	J	ND or <QL	17.9	J	17.9	J	ND or <QL	21.1	J	21.1	J	ND or <QL	196	J	370	JF	*1.888	19.6	J	27.6	JF	*1.408
08A-0007-C2CS	4.49	J	4.49	J	ND or <QL	8.22	J	8.22	J	ND or <QL	10	J	10	J	ND or <QL	67.5	J	127	JF	*1.881	7.05	J	9.93	JF	*1.409
08A-0007-C2DS	0.341	J	0.341	J	ND or <QL	0.454	J	0.454	J	ND or <QL	0.45	J	0.45	J	ND or <QL	4.42		8.34	F	*1.887	< 1.45	U	< 1.45	U	ND or <QL
08A-0007-C2ES	< 0.163	U	< 0.163	U	ND or <QL	< 0.0869	U	< 0.0869	U	ND or <QL	< 0.146	U	< 0.146	U	ND or <QL	< 0.185	U	< 0.185	U	ND or <QL	< 0.139	U	< 0.139	U	ND or <QL
08A-0007-C2FS	< 0.105	U	< 0.105	U	ND or <QL	< 0.0763	U	< 0.0763	U	ND or <QL	0.197	J	0.197	J	ND or <QL	1.21	J	1.21	J	ND or <QL	< 0.788	U	< 0.788	U	ND or <QL
08A-0007-C2GS	< 0.121	U	< 0.121	U	ND or <QL	< 0.114	U	< 0.114	U	ND or <QL	0.237	J	0.237	J	ND or <QL	2.19	J	2.19	J	ND or <QL	< 0.983	U	< 0.983	U	ND or <QL
08A-0007-C2HS	0.384	J	0.384	J	ND or <QL	0.522	J	0.522	J	ND or <QL	0.723	J	0.723	J	ND or <QL	6.3		11.9	F	*1.889	< 0.976	U	< 0.976	U	ND or <QL
08A-0007-C2IS	< 0.125	U	< 0.125	U	ND or <QL	< 0.104	U	< 0.104	U	ND or <QL	< 0.113	U	< 0.113	U	ND or <QL	1.26	J	1.26	J	ND or <QL	< 1.20	U	< 1.20	U	ND or <QL
08A-0007-C2JS	< 0.110	U	< 0.110	U	ND or <QL	< 0.0534	U	< 0.0534	U	ND or <QL	< 0.100	U	< 0.100	U	ND or <QL	1.63	J	1.63	J	ND or <QL	< 1.02	U	< 1.02	U	ND or <QL
08A-0007-C2KS	< 0.101	U	< 0.101	U	ND or <QL	0.247	J	0.247	J	ND or <QL	0.228	J	0.228	J	ND or <QL	0.301	J	0.301	J	ND or <QL	< 0.977	U	< 0.977	U	ND or <QL
08A-0007-C2LS	< 0.0950	U	< 0.0950	U	ND or <QL	< 0.0648	U	< 0.0648	U	ND or <QL	< 0.0901	U	< 0.0901	U	ND or <QL	< 0.110	U	< 0.110	U	ND or <QL	< 0.170	U	< 0.170	U	ND or <QL
08A-0008-C1AS	7.37	J	7.37	J	ND or <QL	13.6	J	13.6	J	ND or <QL	23.8	J	23.8	J	ND or <QL	106	J	200	JF	*1.887	15.4	J	21.7	JF	*1.409
08A-0008-C1BS	7.74	J	7.74	J	ND or <QL	13.6	J	13.6	J	ND or <QL	16.6	J	16.6	J	ND or <QL	119	J	225	JF	*1.891	18.3	J	25.8	JF	*1.410
08A-0008-C1CS	9.37	J	9.37	J	ND or <QL	18.2	J	18.2	J	ND or <QL	19.5	J	19.5	J	ND or <QL	138	J	260	JF	*1.884	20.1	J	28.3	JF	*1.408
08A-0008-C1DS	11.3	J	11.3	J	ND or <QL	17.9	J	17.9	J	ND or <QL	20.9	J	20.9	J	ND or <QL	117	J	221	JF	*1.889	19	J	26.8	JF	*1.411
08A-0008-C1ES	12.9	J	12.9	J	ND or <QL	22.5	J	22.5	J	ND or <QL	24.7	J	24.7	J	ND or <QL	157	J	296	JF	*1.885	21	J	29.6	JF	*1.410
08A-0008-C1ET	11.4	J	11.4	J	ND or <QL	19.6	J	19.6	J	ND or <QL	22.1	J	30.3	JF	*1.371	146	J	276	JF	*1.890	19.2	J	27	JF	*1.406
08A-0008-C1FS	13.8	J	13.8	J	ND or <QL	23.2	J	23.2	J	ND or <QL	25.1	J	25.1	J	ND or <QL	295	J	557	JF	*1.888	22.9	J	32.2	JF	*1.406
08A-0008-C1GS	13.4	J	13.4	J	ND or <QL	25	J	25	J	ND or <QL	24.6	J	24.6	J	ND or <QL	142		268	F	*1.887	19.9		28	F	*1.407
08A-0008-C1HS	13.6	J	13.6	J	ND or <QL	22.2	J	22.2	J	ND or <QL	24.1	J	24.1	J	ND or <QL	189		357	F	*1.889	24.8		34.9	F	*1.407
08A-0008-C1IS	22.6	J	22.6	J	ND or <QL	30.2	J	30.2	J	ND or <QL	42	J	57.5	JF	*1.369	299	J	564	JF	*1.886	40.9	J	57.6	JF	*1.408
08A-0008-C1JS	36.9		40.6	F	*1.100	52.2		58	F	*1.111	79.5		109	F	*1.371	1050		1980	F	*1.886	86.3		122	F	*1.414
08A-0008-C1KS	25.2		27.7	F	*1.099	30.7		34.1	F	*1.111	38.2		52.3	F	*1.369	228		430	F	*1.886	14.9		21	F	*1.409
08A-0009-C3AS	8.32	J	8.32	J	ND or <QL	18.9	J	18.9	J	ND or <QL	16.1	J	16.1	J	ND or <QL	244	J	460	JF	*1.885	19.1	J	26.9	JF	*1.408
08A-0009-C3BS	2.19	J	2.19	J	ND or <QL	4.9	J	4.9	J	ND or <QL	3.95	J	3.95	J	ND or <QL	47.2	J	89.1	JF	*1.888	5.09	J	7.17	JF	*1.409
08A-0009-C3CS	12.9	J	12.9	J	ND or <QL	26.3	J	26.3	J	ND or <QL	27	J	27	J	ND or <QL	279	J	526	JF	*1.885	24.4	J	34.4	JF	*1.410
08A-0009-C3DS	12.2	J	12.2	J	ND or <QL	24.9	J	24.9	J	ND or <QL	25.5	J	25.5	J	ND or <QL	180	J	340	JF	*1.889	22	J	31	JF	*1.409
08A-0009-C3ES	2.81	J	2.81	J	ND or <QL	5.18	J	5.18	J	ND or <QL	5.28	J	5.28	J	ND or <QL	44.1	J	83.2	JF	*1.887	4.29	J	6.04	JF	*1.408
08A-0009-C3FS	9																								

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,7,8-PeCDF 57117-41-6 ng/kg					2,3,4,6,7,8-HxCDF 60851-34-5 ng/kg					2,3,4,7,8-PeCDF 57117-31-4 ng/kg					2,3,7,8-TCDD 1746-01-6 ng/kg					2,3,7,8-TCDF 51207-31-9 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0010-C2MS	4.66	J	4.66	J	ND or <QL	7.13	J	7.13	J	ND or <QL	15.3	J	15.3	J	ND or <QL	83.1	J	157	JF	*1.889	11.8	J	16.6	JF	*1.407
08A-0011-C1AS	10.8	J	10.8	J	ND or <QL	17	J	17	J	ND or <QL	23.1	J	31.6	JF	*1.368	555	J	1050	JF	*1.892	15.6	J	22	JF	*1.410
08A-0011-C1BS	0.458	J	0.458	J	ND or <QL	0.965	J	0.965	J	ND or <QL	0.773	J	0.773	J	ND or <QL	12.5		23.6	F	*1.888	< 1.69	U	< 1.69	U	ND or <QL
08A-0011-C1CS	< 0.201	U	< 0.201	U	ND or <QL	< 0.129	U	< 0.129	U	ND or <QL	< 0.182	U	< 0.182	U	ND or <QL	< 0.226	U	< 0.226	U	ND or <QL	< 0.162	U	< 0.162	U	ND or <QL
08A-0011-C1DS	< 0.136	U	< 0.136	U	ND or <QL	< 0.0896	U	< 0.0896	U	ND or <QL	< 0.125	U	< 0.125	U	ND or <QL	< 0.193	U	< 0.193	U	ND or <QL	< 0.149	U	< 0.149	U	ND or <QL
08A-0011-C1ES	< 0.134	U	< 0.134	U	ND or <QL	< 0.168	U	< 0.168	U	ND or <QL	< 0.124	U	< 0.124	U	ND or <QL	< 0.266	U	< 0.266	U	ND or <QL	< 0.181	U	< 0.181	U	ND or <QL
08A-0011-C1ET	< 0.187	U	< 0.187	U	ND or <QL	< 0.139	U	< 0.139	U	ND or <QL	< 0.166	U	< 0.166	U	ND or <QL	< 0.255	U	< 0.255	U	ND or <QL	< 0.188	U	< 0.188	U	ND or <QL
08A-0011-C1FS	< 0.154	U	< 0.154	U	ND or <QL	< 0.168	U	< 0.168	U	ND or <QL	< 0.140	U	< 0.140	U	ND or <QL	< 0.308	U	< 0.308	U	ND or <QL	< 0.208	U	< 0.208	U	ND or <QL
08A-0011-C1GS	< 0.0785	U	< 0.0785	U	ND or <QL	< 0.0912	U	< 0.0912	U	ND or <QL	< 0.0706	U	< 0.0706	U	ND or <QL	< 0.103	U	< 0.103	U	ND or <QL	< 0.788	U	< 0.788	U	ND or <QL
08A-0011-C1HS	< 0.0550	U	< 0.0550	U	ND or <QL	< 0.107	U	< 0.107	U	ND or <QL	< 0.0480	U	< 0.0480	U	ND or <QL	< 0.0846	U	< 0.0846	U	ND or <QL	< 0.0706	U	< 0.0706	U	ND or <QL
08A-0011-C1IS	< 0.155	U	< 0.155	U	ND or <QL	< 0.171	U	< 0.171	U	ND or <QL	< 0.142	U	< 0.142	U	ND or <QL	< 0.320	U	< 0.320	U	ND or <QL	< 0.258	U	< 0.258	U	ND or <QL
08A-0011-C1JS	< 0.121	U	< 0.121	U	ND or <QL	< 0.101	U	< 0.101	U	ND or <QL	< 0.118	U	< 0.118	U	ND or <QL	< 0.193	U	< 0.193	U	ND or <QL	< 0.123	U	< 0.123	U	ND or <QL
08A-0011-C1KS	< 0.158	U	< 0.158	U	ND or <QL	< 0.189	U	< 0.189	U	ND or <QL	< 0.151	U	< 0.151	U	ND or <QL	< 0.245	U	< 0.245	U	ND or <QL	< 0.149	U	< 0.149	U	ND or <QL
08A-0011-C1LS	< 0.169	U	< 0.169	U	ND or <QL	< 0.127	U	< 0.127	U	ND or <QL	< 0.153	U	< 0.153	U	ND or <QL	< 0.236	U	< 0.236	U	ND or <QL	< 0.219	U	< 0.219	U	ND or <QL
08A-0011-C1MS	< 0.121	U	< 0.121	U	ND or <QL	< 0.0809	U	< 0.0809	U	ND or <QL	< 0.112	U	< 0.112	U	ND or <QL	< 0.203	U	< 0.203	U	ND or <QL	< 0.171	U	< 0.171	U	ND or <QL
08A-0012-C1AS	6.72	J	6.72	J	ND or <QL	13.9	J	13.9	J	ND or <QL	13.9	J	13.9	J	ND or <QL	84.3	J	159	JF	*1.886	11.6		16.3	F	*1.405
08A-0012-C1BS	5.54	J	5.54	J	ND or <QL	9.64	J	9.64	J	ND or <QL	10.7	J	10.7	J	ND or <QL	75.1	J	142	JF	*1.891	7.67	J	10.8	JF	*1.408
08A-0012-C1CS	3.21	J	3.21	J	ND or <QL	3.91	J	3.91	J	ND or <QL	5.16	J	5.16	J	ND or <QL	22	J	41.5	JF	*1.886	5.06	J	7.12	JF	*1.407
08A-0012-C1DS	16.2	J	16.2	J	ND or <QL	24.1	J	24.1	J	ND or <QL	28.2	J	28.2	J	ND or <QL	165	J	311	JF	*1.885	21.2	J	29.8	JF	*1.406
08A-0012-C1ES	15.2	J	15.2	J	ND or <QL	22.4	J	22.4	J	ND or <QL	23.7	J	32.5	JF	*1.371	172	J	325	JF	*1.890	19.3	J	27.2	JF	*1.409
08A-0012-C1FS	6.43	J	6.43	J	ND or <QL	8.5	J	8.5	J	ND or <QL	11.3	J	11.3	J	ND or <QL	90.6	J	171	JF	*1.887	11.1	J	15.6	JF	*1.405
08A-0012-C1FT	12.1	J	12.1	J	ND or <QL	17.6	J	17.6	J	ND or <QL	20	J	20	J	ND or <QL	145	J	274	JF	*1.890	21	J	29.6	JF	*1.410
08A-0012-C1GS	19	J	19	J	ND or <QL	27.1	J	30.1	JF	*1.111	34.3	J	47	JF	*1.370	654	J	1230	JF	*1.881	23.1	J	32.5	JF	*1.407
08A-0012-C1HS	3.42	J	3.42	J	ND or <QL	4.43	J	4.43	J	ND or <QL	6.12	J	6.12	J	ND or <QL	29.8	J	56.2	JF	*1.886	6.13	J	8.63	JF	*1.408
08A-0012-C1IS	26.2		28.8	F	*1.099	32	J	35.6	JF	*1.113	43.3		59.3	F	*1.370	254		479	F	*1.886	43.9		61.8	F	*1.408
08A-0012-C1JS	9.69	J	9.69	J	ND or <QL	13.3	J	13.3	J	ND or <QL	23.8	J	23.8	J	ND or <QL	173	J	326	JF	*1.884	22	J	31	JF	*1.409
08A-0013-C2AS	6.87	J	6.87	J	ND or <QL	14.5	J	14.5	J	ND or <QL	13.9	J	13.9	J	ND or <QL	179	J	338	JF	*1.888	14.5	J	20.4	JF	*1.407
08A-0013-C2BS	8.81	J	8.81	J	ND or <QL	26.2	J	29.1	JF	*1.111	24	J	32.9	JF	ND or <QL	190	J	359	JF	*1.889	15.6	J	22	JF	*1.410
08A-0013-C2CS	9.08	J	9.08	J	ND or <QL	18.8	J	18.8	J	ND or <QL	19.5	J	19.5	J	ND or <QL	285	J	538	JF	*1.888	13.7	J	19.3	JF	*1.409
08A-0013-C2DS	11.9	J	11.9	J	ND or <QL	20.7	J	20.7	J	ND or <QL	22.2	J	22.2	J	ND or <QL	189	J	357	JF	*1.889	24.6	J	34.6	JF	*1.407
08A-0013-C2ES	13.1	J	13.1	J	ND or <QL	22.9	J	22.9	J	ND or <QL	26	J	26	J	ND or <QL	158	J	298	JF	*1.886	24.9	J	35.1	JF	*1.410
08A-0013-C2FS	20.2	J	20.2	J	ND or <QL	31.4	J	31.4	J	ND or <QL	36.6	J	50.1	JF	*1.369	214	J	404	JF	*1.888	29.6	J	41.7	JF	*1.409
08A-0013-C2FT	18.3	J	18.3	J	ND or <QL	29.4	J	29.4	J	ND or <QL	33.5	J	33.5	J	ND or <QL	290	J	547	JF	*1.886	19.9	J	28	JF	*1.407
08A-0013-C2GS	13.8	J	13.8	J	ND or <QL	20.1	J	20.1	J	ND or <QL	23.8	J	23.8	J	ND or <QL	152		287	F	*1.888	20.6		29	F	*1.408
08A-0013-C2GT	15.2	J	15.2	J	ND or <QL	23	J	23	J	ND or <QL	27.5		37.7	F	*1.371	168		317	F	*1.887	22.5	J	31.7	JF	*1.409
08A-0013-C2HS	24.9	J	27.4	JF																					

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,7,8-PeCDF 57117-41-6 ng/kg					2,3,4,6,7,8-HxCDF 60851-34-5 ng/kg					2,3,4,7,8-PeCDF 57117-31-4 ng/kg					2,3,7,8-TCDD 1746-01-6 ng/kg					2,3,7,8-TCDF 51207-31-9 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0015-C2AS	8.53	J	8.53	J	ND or <QL	13.9	J	13.9	J	ND or <QL	18.2	J	18.2	J	ND or <QL	109	J	206	JF	*1.890	12.2	J	17.2	JF	*1.410
08A-0015-C2BS	6.65	J	6.65	J	ND or <QL	11.2	J	11.2	J	ND or <QL	12.6	J	12.6	J	ND or <QL	115	J	217	JF	*1.887	11.3	J	15.9	JF	*1.407
08A-0015-C2CS	14.1	J	14.1	J	ND or <QL	24.6	J	24.6	J	ND or <QL	29.6	J	29.6	J	ND or <QL	187	J	353	JF	*1.888	20.4	J	28.7	JF	*1.407
08A-0015-C2DS	18.1	J	18.1	J	ND or <QL	27.3	J	27.3	J	ND or <QL	42	J	57.5	JF	*1.369	222	J	419	JF	*1.887	38.2	J	53.8	JF	*1.408
08A-0015-C2ES	13.8	J	13.8	J	ND or <QL	19.8	J	19.8	J	ND or <QL	45		61.7	F	*1.371	143		270	F	*1.888	59.8		84.2	F	*1.408
08A-0015-C2FS	36.8		40.4	F	*1.098	27.4	J	27.4	J	ND or <QL	148		203	F	*1.372	437		825	F	*1.888	195		275	F	*1.410
08A-0015-C2GS	2.12	J	2.12	J	ND or <QL	2.89	J	2.89	J	ND or <QL	2.83	J	2.83	J	ND or <QL	84.1		159	F	*1.891	4.57		6.43	F	*1.407
08A-0015-C2HS	< 0.0615	U	< 0.0615	U	ND or <QL	< 0.119	U	< 0.119	U	ND or <QL	< 0.0593	U	< 0.0593	U	ND or <QL	0.337	J	0.337	J	ND or <QL	< 0.882	U	< 0.882	U	ND or <QL
08A-0015-C2IS	< 0.266	U	< 0.266	U	ND or <QL	< 0.197	U	< 0.197	U	ND or <QL	< 0.241	U	< 0.241	U	ND or <QL	< 0.393	U	< 0.393	U	ND or <QL	< 0.253	U	< 0.253	U	ND or <QL
08A-0015-C2JS	< 0.183	U	< 0.183	U	ND or <QL	< 0.128	U	< 0.128	U	ND or <QL	< 0.169	U	< 0.169	U	ND or <QL	< 0.316	U	< 0.316	U	ND or <QL	< 0.255	U	< 0.255	U	ND or <QL
08A-0016-C1AS	4.45	J	4.45	J	ND or <QL	8.85	J	8.85	J	ND or <QL	8.16	J	8.16	J	ND or <QL	88.5	J	167	JF	*1.887	7.11	J	10	JF	*1.406
08A-0016-C1BS	10	J	10	J	ND or <QL	22.6	J	22.6	J	ND or <QL	19.9	J	19.9	J	ND or <QL	178	J	336	JF	*1.888	18.8	J	26.5	JF	*1.410
08A-0016-C1CS	8.55	J	8.55	J	ND or <QL	19.1	J	19.1	J	ND or <QL	16.9	J	16.9	J	ND or <QL	1220	J	2300	JF	*1.885	22	J	31	JF	*1.409
08A-0016-C1DS	10.1	J	10.1	J	ND or <QL	23	J	23	J	ND or <QL	20.2	J	20.2	J	ND or <QL	216	J	408	JF	*1.889	24.5	J	34.5	JF	*1.408
08A-0016-C1ES	10.4	J	10.4	J	ND or <QL	24.9	J	24.9	J	ND or <QL	22.5	J	22.5	J	ND or <QL	210	J	396	JF	*1.886	20	J	28.2	JF	*1.410
08A-0016-C1ET	11	J	11	J	ND or <QL	23	J	23	J	ND or <QL	22.5	J	22.5	J	ND or <QL	231	J	436	JF	*1.887	18.1	J	25.5	JF	*1.409
08A-0016-C1FS	12.8	J	12.8	J	ND or <QL	22.7	J	22.7	J	ND or <QL	38.6	J	52.9	JF	*1.370	199	J	376	JF	*1.889	23.9	J	33.7	JF	*1.410
08A-0016-C1GS	17.5	J	17.5	J	ND or <QL	32.1	J	35.7	JF	*1.112	32.7	J	44.8	JF	*1.370	247	J	466	JF	*1.887	26.8	J	37.7	JF	*1.407
08A-0016-C1HS	3.2	J	3.2	J	ND or <QL	5.37	J	5.37	J	ND or <QL	6.3	J	6.3	J	ND or <QL	40.6	J	76.6	JF	*1.887	3.76	J	5.29	JF	*1.407
08A-0016-C1IS	22.6	J	22.6	J	ND or <QL	33.5	J	37.2	JF	*1.110	43.2	J	59.2	JF	*1.370	504	J	951	JF	*1.887	31.6	J	44.5	JF	*1.408
08A-0016-C1JS	20.4	J	20.4	J	ND or <QL	40.2	J	44.7	JF	*1.112	67.9	J	93	JF	*1.370	656	J	1240	JF	*1.890	51.3	J	72.2	JF	*1.407
08A-0016-C1KS	31.2	J	31.2	J	ND or <QL	47.1	J	52.3	JF	*1.110	112	J	153	JF	*1.366	1580	J	2980	JF	*1.886	83.5	J	118	JF	*1.413
08A-0016-C1LS	30.9	J	34	JF	*1.100	52.6	J	58.4	JF	*1.110	78.7	J	108	JF	*1.372	1160	J	2190	JF	*1.888	58.5	J	82.4	JF	*1.409
08A-0017-C1AS	13.4	J	13.4	J	ND or <QL	23.7	J	23.7	J	ND or <QL	25.5	J	25.5	J	ND or <QL	225	J	425	JF	*1.889	16.5	J	23.2	JF	*1.406
08A-0017-C1AT	13.3	J	13.3	J	ND or <QL	22.5	J	22.5	J	ND or <QL	24.2	J	24.2	J	ND or <QL	215	J	406	JF	*1.888	20.3	J	28.6	JF	*1.409
08A-0017-C1BS	17.8	J	25.6		Split-Replaced	26.8	J	27.7	B	Split-Replaced	31.8	J	38	B	Split-Replaced	224	J	279	B	Split-Replaced	19	J	32.2		Split-Replaced
08A-0017-C1CS	27.4	J	27.4	J	ND or <QL	45.6	J	50.7	JF	*1.112	48.2	J	66	JF	*1.369	288	J	543	JF	*1.885	32.3	J	45.5	JF	*1.409
08A-0017-C1DS	22.9	J	22.5		Split-Replaced	32.3	J	33.8	B	Split-Replaced	39.1	J	43.3	B	Split-Replaced	212	J	262	B	Split-Replaced	18.7	J	28.1		Split-Replaced
08A-0017-C1ES	23.9	J	23.9	J	ND or <QL	39.8	J	44.2	JF	*1.111	44.6	J	61.1	JF	*1.370	258	J	487	JF	*1.888	23	J	32.4	JF	*1.409
08A-0017-C1FS	38.5	J	42.3	JF	*1.099	52.4	J	58.2	JF	*1.111	66.1	J	90.6	JF	*1.371	636	J	1200	JF	*1.887	31.9	J	44.9	JF	*1.408
08A-0017-C1GS	25	J	25	J	ND or <QL	44.8	J	49.8	JF	*1.112	48	J	65.8	JF	*1.371	468	J	883	JF	*1.887	27.5	J	38.7	JF	*1.407
08A-0017-C1HS	51	J	56	JF	*1.098	77.4	J	86	JF	*1.111	90.2	J	124	JF	*1.375	1900	J	3590	JF	*1.889	76.3	J	107	JF	*1.402
08A-0017-C1IS	54.3	J	59.7	JF	*1.099	89.6	J	99.5	JF	*1.110	99.7	J	137	JF	*1.374	3010	J	5680	JF	*1.887	77.4	J	109	JF	*1.408
08A-0017-C1JS	36.9	J	40.6	JF	*1.100	65.3	J	72.5	JF	*1.110	64.6	J	88.5	JF	*1.370	1800	J	3400	JF	*1.889	59.6	J	83.9	JF	*1.408
08A-0017-C1KS	3.69	J	3.69	J	ND or <QL	3.03	J	3.03	J	ND or <QL	3.95	J	3.95	J	ND or <QL	2.13	J	2.13	J	ND or <QL	6.57		9.25	F	*1.408
08A-0017-C1LS	< 0.203	U	< 0.203	U	ND or <QL	< 0.199	U	< 0.199	U	ND or <QL	< 0.196	U	< 0.196	U	ND or <QL	< 0.310	U	< 0.310	U	ND or <QL	< 1.65	U	< 1.65	U	ND or <QL
08A-0017-C1MS	6.09	J	6.09	J	ND or <QL	5.68	J	5.68	J	ND or <QL	6.51	J	6.51	J	ND or <QL	< 1.30	UJ	< 1.30	UJ	ND or <QL	11.1		15.6	F	*1.405
08A-0017-C1NS	< 0.115	UJ	< 0.115	UJ	ND or <QL	< 0.157	UJ	< 0.157	U																

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,7,8-PeCDF 57117-41-6 ng/kg					2,3,4,6,7,8-HxCDF 60851-34-5 ng/kg					2,3,4,7,8-PeCDF 57117-31-4 ng/kg					2,3,7,8-TCDD 1746-01-6 ng/kg					2,3,7,8-TCDF 51207-31-9 ng/kg				
	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0019-D1AS	9.89	J	9.89	J	ND or <QL	19.6	J	19.6	J	ND or <QL	24.7	J	24.7	J	ND or <QL	239	J	451	JF	*1.887	22.8	J	32.1	JF	*1.408
08A-0019-D1BS	6.4	J	6.4	J	ND or <QL	13	J	13	J	ND or <QL	14	J	14	J	ND or <QL	159	J	300	JF	*1.887	14	J	19.7	JF	*1.407
08A-0019-D1CS	7.19	J	7.19	J	ND or <QL	13.5	J	13.5	J	ND or <QL	20.3	J	20.3	J	ND or <QL	139	J	262	JF	*1.885	14.6	J	20.6	JF	*1.411
08A-0019-D1DS	9.77	J	9.77	J	ND or <QL	18.2	J	18.2	J	ND or <QL	20.4	J	20.4	J	ND or <QL	171	J	323	JF	*1.889	16.6	J	23.4	JF	*1.410
08A-0019-D1ES	19.2	J	19.2	J	ND or <QL	32.7	J	36.3	JF	*1.110	55.8	J	76.4	JF	*1.369	506	J	955	JF	*1.887	40.9	J	57.6	JF	*1.408
08A-0020-C2AS	8.62	J	8.62	J	ND or <QL	14.1	J	14.1	J	ND or <QL	19.5	J	19.5	J	ND or <QL	121	J	228	JF	*1.884	15.5	J	21.8	JF	*1.406
08A-0020-C2BS	15.8	J	15.8	J	ND or <QL	24.6	J	24.6	J	ND or <QL	33	J	33	J	ND or <QL	198	J	374	JF	*1.889	25.5	J	35.9	JF	*1.408
08A-0020-C2BT	5.57	J	5.57	J	ND or <QL	8.73	J	8.73	J	ND or <QL	11	J	11	J	ND or <QL	61.4	J	116	JF	*1.889	10.5	J	14.8	JF	*1.410
08A-0020-C2CS	17.4	J	32.7		Split-Replaced	32.1	J	46.3	B	Split-Replaced	61.5	J	115	B	Split-Replaced	149	J	325	B	Split-Replaced	34.6	J	66.2		Split-Replaced
08A-0020-C2DS	15.4	J	48.2		Split-Replaced	37.2	J	84.2	B	Split-Replaced	31.8	J	95.2	B	Split-Replaced	255	J	1170	B	Split-Replaced	21.5	J	64.1		Split-Replaced
08A-0020-C2ES	46.7	J	99		Split-Replaced	58.7	J	119	B	Split-Replaced	75.1	J	147	B	Split-Replaced	2770	J	6150	B	Split-Replaced	82.6	J	137		Split-Replaced
08A-0020-C2FS	18.2	J	18.2	J	ND or <QL	39	J	39	J	ND or <QL	32.6	J	32.6	J	ND or <QL	1160	J	2190	JF	*1.888	20	J	28.2	JF	*1.410
08A-0020-C2FT	50.5	J	55.5	JF	*1.099	138	J	153	JF	*1.109	90.5	J	124	JF	*1.370	2580	J	4870	JF	*1.888	52.3	J	73.6	JF	*1.407
08A-0020-C2GS	4.71	J	4.71	J	ND or <QL	8.74	J	8.74	J	ND or <QL	5.6	J	5.6	J	ND or <QL	11.3	J	21.3	JF	*1.885	5.91	J	8.32	JF	*1.408
08A-0020-C2HS	1.33	J	1.33	J	ND or <QL	< 1.14	U	< 1.14	U	ND or <QL	1.45	J	1.45	J	ND or <QL	2.2	J	2.2	J	ND or <QL	2.65		3.73	F	*1.408
08A-0021-C1AS	8.97	J	8.97	J	ND or <QL	19.8	J	19.8	J	ND or <QL	20	J	20	J	ND or <QL	277	J	523	JF	*1.888	22.1	J	31.1	JF	*1.407
08A-0021-C1BS	12.7	J	12.7	J	ND or <QL	29.8		33.1	F	*1.111	51.3		70.3	F	*1.370	140		264	F	*1.886	29.4	J	41.4	JF	*1.408
08A-0021-C1CS	15.6	J	15.6	J	ND or <QL	28.5		28.5		ND or <QL	31.9		43.7	F	*1.370	529		998	F	*1.887	30.2		42.5	F	*1.407
08A-0021-C1DS	31	J	31	J	ND or <QL	53.5	J	59.4	JF	*1.110	53.9	J	73.8	JF	*1.369	1750	J	3300	JF	*1.886	77.2	J	109	JF	*1.412
08A-0021-C1ES	120	J	132	JF	*1.100	127	J	141	JF	*1.110	145	J	199	JF	*1.372	126000	J	238000	JF	*1.889	148	J	208	JF	*1.405
08A-0021-C1FS	163	J	179	JF	*1.098	233	J	259	JF	*1.112	253	J	347	JF	*1.372	29200	J	55100	JF	*1.887	198	J	279	JF	*1.409
08A-0021-C1FT	183	J	201	JF	*1.098	219	J	243	JF	*1.110	237	J	325	JF	*1.371	32800	J	61900	JF	*1.887	232	J	327	JF	*1.409
08A-0021-C1GS	102	J	112	JF	*1.098	242	J	269	JF	*1.112	110	J	151	JF	*1.373	267	J	504	JF	*1.888	56.5	J	79.6	JF	*1.409
08A-0021-C1HS	18.9	J	18.9	J	ND or <QL	63.1		70.1	F	*1.111	28.5		39	F	*1.368	7.22		13.6	F	*1.884	18.4		25.9	F	*1.408
08A-0022-C1AS	14.4	J	14.4	J	ND or <QL	26.1	J	26.1	J	ND or <QL	28	J	28	J	ND or <QL	710	J	1340	JF	*1.887	32.7	J	46	JF	*1.407
08A-0022-C1BS	32.9	J	36.2	JF	*1.100	54.9	J	61	JF	*1.111	67.9	J	93	JF	*1.370	330	J	623	JF	*1.888	48.4	J	68.1	JF	*1.407
08A-0022-C1CS	53.2	J	58.5	JF	*1.100	85.4	J	94.9	JF	*1.111	171	J	234	JF	*1.368	1490	J	2810	JF	*1.886	164	J	231	JF	*1.409
08A-0022-C1DS	50.4		55.4	F	*1.099	71.4		79.3	F	*1.111	157		215	F	*1.369	4680		8830	F	*1.887	102		144	F	*1.412
08A-0022-C1ES	1.87	J	1.87	J	ND or <QL	1.38	J	1.38	J	ND or <QL	2.14	J	2.14	J	ND or <QL	3.94		7.43	F	*1.886	7.15	J	10.1	JF	*1.413
08A-0022-C1FS	< 0.128	U	< 0.128	U	ND or <QL	< 0.187	U	< 0.187	U	ND or <QL	< 0.129	U	< 0.129	U	ND or <QL	< 0.508	UJ	< 0.508	UJ	ND or <QL	< 2.10	U	< 2.10	U	ND or <QL
08A-0022-C1GS	< 0.0648	U	< 0.0648	U	ND or <QL	< 0.135	U	< 0.135	U	ND or <QL	< 0.0648	U	< 0.0648	U	ND or <QL	0.308	J	0.308	J	ND or <QL	< 0.0884	U	< 0.0884	U	ND or <QL
08A-0022-C1HS	1.87	J	1.87	J	ND or <QL	2.48	J	2.48	J	ND or <QL	1.88	J	1.88	J	ND or <QL	< 0.667	UJ	< 0.667	UJ	ND or <QL	< 1.47	U	< 1.47	U	ND or <QL
08A-0022-C1IS	< 0.0675	U	< 0.0675	U	ND or <QL	< 0.276	U	< 0.276	U	ND or <QL	< 0.0706	U	< 0.0706	U	ND or <QL	< 0.0721	U	< 0.0721	U	ND or <QL	< 1.25	U	< 1.25	U	ND or <QL
08A-0022-C1JS	< 0.0745	U	< 0.0745	U	ND or <QL	< 0.0958	U	< 0.0958	U	ND or <QL	< 0.0754	U	< 0.0754	U	ND or <QL	1.42	J	1.42	J	ND or <QL	< 0.510	U	< 0.510	U	ND or <QL
08A-0022-D2AS	12.7	J	12.7	J	ND or <QL	24.2	J	24.2	J	ND or <QL	24.7	J	24.7	J	ND or <QL	220	J	415	JF	*1.886	18.8	J	26.5	JF	*1.410
08A-0022-D2BS	5.64	J	5.64	J	ND or <QL	11.5	J	11.5	J	ND or <QL	11.9	J	11.9	J	ND or <QL	87.1	J	164	JF	*1.883	10.4	J	14.6	JF	*1.404
08A-0022-D2CS	9.98	J	9.98	J	ND or <QL	15.8	J	15.8	J	ND or <QL	16.8	J	16.8	J	ND or <QL	152	J	287	JF	*1.888	15.3	J	21.5	JF	*1.405
08A-0022-D2DS	35.6	J	39.1	JF	*1.098	52.9	J	58.8	JF	*1.112	60.4	J	82.7	JF	*1.369	388	J	732	JF	*1.887	41	J	57.7	JF	*1.407
08A-0022-D2ES	421	J	463	JF	*1.100	90.7	J	101	JF	*1.114	113	J	155	JF	*1.372	405	J	764	JF	*1.886	142	J	200	JF	*1.408
08A-0023-C2AS	6.88	J	6.88	J	ND or <QL	13.4	J	13.4	J	ND or <QL	15.2	J	15.2	J	ND or <QL	155	J	292	JF	*1.884	13.4	J	18.9	JF	*1.410
08A-0023-C2BS	13.1	J	13.1	J	ND or <QL	25.6	J	25.6	J	ND or <QL	26	J	26	J	ND or <QL	248	J	468	JF	*1.887	27.7	J	39	JF	*1.408
08A-0023-C2CS	16.1	J	16.1	J	ND or <QL	31.2	J	31.2	J	ND or <QL	33.1	J	45.3	JF	*1.369	545	J	1030	JF	*1.890	33.1	J	46.6	JF	*1.408
08A-0023-C2DS	18.8	J	18.8	J	ND or <QL	31.8	J	31.8	J	ND or <QL	114	J	156	JF	*1.368	409	J	772	JF	*1.888	104	J	146	JF	*1.404
08A-0023-C2ES	40	J	44	JF	*1.100	50.9	J	56.5	JF	*1.110	54.2	J	74.3	JF	*1.371	1940	J	3660	JF	*1.887	64.3	J	90.5	JF	*1.407
08A-0023-C2FS	29.5	J	29.5	J	ND or <QL	44.7	J	49.7	JF	*1.112	45.1	J	61.8	JF	*1.370	6390	J	12100	JF	*1.894	69.1	J	97.3	JF	*1.408
08A-0023-C2GS	59.6	J	65.5	JF	*1.099	56.4	J	62.7	JF	*1.112	70.4	J	96.4	JF	*1.369	10900	J	20600	JF	*1.890	71.9	J	101	JF	*1.405
08A-0023-C2HS	283	J	311	JF	*1.099	189	J	210	JF	*1.111	210	J	288	JF	*1.371	67100	J	127000	JF	*1.893	339	J	477	JF	*1.407
08A-0023-C2IS	29.9	J	32.9	JF	*1.100	35.2	J	39.1	JF	*1.111	46.5	J	63.7	JF	*1.370	26.7	J	50.4	JF	*1.888	25.5	J	35.9	JF	*1.408
08A-0023-C2JS	5.61	J	5.61	J	ND or <QL	2.88	J	2.88	J	ND or <QL	4.71	J	4.71	J	ND or <QL	4.92		9.28	F	*1.886	8.59		12.1	F	*1.409
08A-0024-C1AS	12.8	J	12.8	J	ND or <QL	24.4	J	24.4	J	ND or <QL	28	J	28	J	ND or <QL	406	J	766	JF	*1.887	25.5	J	35.9	JF	*1.408
08A-0024-C1BS	49.9	J	54.8	JF	*1.098	59.6	J	66.2	JF	*1.111	64.8	J	88.8	JF	*1.370	2200	J	4150	JF	*1.886	75.2	J	106	JF	*1.410
08A-0024-C1CS	52.5	J	57.7	JF	*1.099	82.6	J	91.8	JF	*1.111	103	J	141	JF	*1.369	9780	J	18500	JF	*1.892	113	J	159	JF	*1.407
08A-0024-C1DS	79.2	J	87	JF	*1.098	108	J	120	JF	*1.111	125	J	171	JF	*1.368	3790	J	7150	JF	*1.887	113	J	159	JF	*1.407

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,7,8-PeCDF 57117-41-6 ng/kg					2,3,4,6,7,8-HxCDF 60851-34-5 ng/kg					2,3,4,7,8-PeCDF 57117-31-4 ng/kg					2,3,7,8-TCDD 1746-01-6 ng/kg					2,3,7,8-TCDF 51207-31-9 ng/kg				
	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0024-C1ES	197	J	217	JF	*1.102	125	J	139	JF	*1.112	137	J	188	JF	*1.372	15100	J	28500	JF	*1.887	195	J	275	JF	*1.410
08A-0024-C1FS	82.7	J	90.9	JF	*1.099	161	J	179	JF	*1.112	150	J	206	JF	*1.373	6730	J	12700	JF	*1.887	64.5	J	90.8	JF	*1.408
08A-0024-C1FT	84.9	J	93.3	JF	*1.099	182	J	202	JF	*1.110	150	J	206	JF	*1.373	22000	J	41500	JF	*1.886	66.6	J	93.8	JF	*1.408
08A-0024-C1GS	8.67	J	8.67	J	ND or <QL	23.7	J	23.7	J	ND or <QL	12.4	J	12.4	J	ND or <QL	22.5		42.5	F	*1.889	10.8		15.2	F	*1.407
08A-0024-C1HS	2.21	J	2.21	J	ND or <QL	2.68	J	2.68	J	ND or <QL	2.53	J	2.53	J	ND or <QL	14.7		27.7	F	*1.884	4.07		5.73	F	*1.408
08A-0025-C1AS	1.19	J	1.19	J	ND or <QL	2.81	J	2.81	J	ND or <QL	2.95	J	2.95	J	ND or <QL	21.7	J	40.9	JF	*1.885	3.08	J	3.08	J	ND or <QL
08A-0025-C1BS	2.36	J	2.36	J	ND or <QL	4.37	J	4.37	J	ND or <QL	4.95	J	4.95	J	ND or <QL	40	J	75.5	JF	*1.888	5.25	J	7.39	JF	*1.408
08A-0025-C1CS	5.33	J	5.33	J	ND or <QL	8.89	J	8.89	J	ND or <QL	10.1	J	10.1	J	ND or <QL	255	J	481	JF	*1.886	8.49	J	12	JF	*1.413
08A-0025-C1DS	7.94	J	7.94	J	ND or <QL	16.3	J	16.3	J	ND or <QL	15	J	15	J	ND or <QL	798		1510	F	*1.892	21.3	J	30	JF	*1.408
08A-0025-C1ES	40.7	J	44.7	JF	*1.098	85.3	J	94.8	JF	*1.111	78.5	J	108	JF	*1.376	4750	J	8960	JF	*1.886	108	J	152	JF	*1.407
08A-0025-C1ET	38.3	J	42.1	JF	*1.099	52.1	J	57.9	JF	*1.111	80.9	J	111	JF	*1.372	4760	J	8980	JF	*1.887	121	J	170	JF	*1.405
08A-0025-C1FS	106	J	116	JF	*1.094	162	J	180	JF	*1.111	167	J	229	JF	*1.371	7910	J	14900	JF	*1.884	229	J	322	JF	*1.406
08A-0025-C1GS	9.81	J	9.81	J	ND or <QL	11.5	J	11.5	J	ND or <QL	9.86	J	9.86	J	ND or <QL	3.79	J	7.15	JF	*1.887	16	J	22.5	JF	*1.406
08A-0026-C1AS	10.7	J	10.7	J	ND or <QL	20.6	J	20.6	J	ND or <QL	22.3	J	22.3	J	ND or <QL	209	J	394	JF	*1.885	21.6	J	30.4	JF	*1.407
08A-0026-C1BS	26.1	J	26.1	J	ND or <QL	43.8	J	48.7	JF	*1.112	68.7	J	94.1	JF	*1.370	339	J	640	JF	*1.888	45.4	J	63.9	JF	*1.407
08A-0026-C1CS	4.05	J	4.05	J	ND or <QL	5.71	J	5.71	J	ND or <QL	18.5	J	18.5	J	ND or <QL	57.4	J	108	JF	*1.882	16.2	J	22.8	JF	*1.407
08A-0026-C1DS	< 0.0634	U	< 0.0634	U	ND or <QL	0.171	J	0.171	J	ND or <QL	0.124	J	0.124	J	ND or <QL	< 0.244	UJ	< 0.244	UJ	ND or <QL	< 1.87	U	< 1.87	U	ND or <QL
08A-0026-C1ES	0.0782	J	< 0.247	U	Split-Replaced	< 0.0796	U	< 0.151	U	Split-Replaced	0.102	J	< 0.268	U	Split-Replaced	< 0.258	UJ	< 0.431	U	Split-Replaced	< 1.65	U	< 0.151	U	Split-Replaced
08A-0027-C1AS	3.31	J	3.31	J	ND or <QL	5.86	J	5.86	J	ND or <QL	7.37	J	7.37	J	ND or <QL	69.9	J	132	JF	*1.888	< 7.02	UJ	< 7.02	UJ	ND or <QL
08A-0027-C1BS	4.08	J	4.08	J	ND or <QL	7.69	J	7.69	J	ND or <QL	8.58	J	8.58	J	ND or <QL	91.1	J	172	JF	*1.888	8.53	J	12	JF	*1.407
08A-0027-C1CS	3.25	J	3.25	J	ND or <QL	5.03	J	5.03	J	ND or <QL	6.86	J	6.86	J	ND or <QL	52.6	J	99.3	JF	*1.888	5.81	J	8.18	JF	*1.408
08A-0027-C1DS	17.9	J	17.9	J	ND or <QL	31.3	J	31.3	J	ND or <QL	40.2	J	55.1	JF	*1.371	351	J	662	JF	*1.886	32.7	J	46	JF	*1.407
08A-0027-C1ES	5.49	J	5.49	J	ND or <QL	8.65	J	8.65	J	ND or <QL	23.3	J	23.3	J	ND or <QL	97.2	J	183	JF	*1.883	18.6	J	26.2	JF	*1.409
08A-0027-C1FS	19.7	J	19.7	J	ND or <QL	30.9	J	34.3	JF	*1.110	180	J	247	JF	*1.372	338	J	638	JF	*1.888	110	J	155	JF	*1.409
08A-0027-C1GS	42.1		46.3	F	*1.100	76.5		85	F	*1.111	79.8		109	F	*1.366	7720		14600	F	*1.891	89.3		126	F	*1.411
08A-0027-C1HS	18.9	J	18.9	J	ND or <QL	27.5	J	30.6	JF	*1.113	33.8	J	46.3	JF	*1.370	2040	J	3850	JF	*1.887	58.9	J	82.9	JF	*1.407
08A-0027-C1IS	18.3	J	18.3	J	ND or <QL	46.9		52.1	F	*1.111	36.7		50.3	F	*1.371	3610		6810	F	*1.886	62.4		87.9	F	*1.409
08A-0028-C2AS	7.12	J	7.12	J	ND or <QL	17.3	J	17.3	J	ND or <QL	20.3	J	20.3	J	ND or <QL	165	J	311	JF	*1.885	17.4	J	24.5	JF	*1.408
08A-0028-C2BS	7.17	J	7.17	J	ND or <QL	15.1	J	15.1	J	ND or <QL	17.5	J	17.5	J	ND or <QL	188	J	355	JF	*1.888	17.7	J	24.9	JF	*1.407
08A-0028-C2CS	12	J	12	J	ND or <QL	16.6	J	16.6	J	ND or <QL	25.5	J	25.5	J	ND or <QL	285	J	538	JF	*1.888	27.8	J	39.1	JF	*1.406
08A-0028-C2DS	9.09	J	9.09	J	ND or <QL	18.9	J	18.9	J	ND or <QL	23.6	J	23.6	J	ND or <QL	200	J	377	JF	*1.885	19.3	J	27.2	JF	*1.409
08A-0028-C2ES	17.6	J	17.6	J	ND or <QL	40.2	J	44.7	JF	*1.112	56.6	J	77.5	JF	*1.369	1250	J	2360	JF	*1.888	52.4	J	73.8	JF	*1.408
08A-0028-C2FS	51.2	J	56.3	JF	*1.100	73.8	J	82	JF	*1.111	149	J	204	JF	*1.369	13800	J	26000	JF	*1.884	209	J	294	JF	*1.407
08A-0028-C2GS	5.77	J	5.77	J	ND or <QL	4.14	J	4.14	J	ND or <QL	5.63	J	5.63	J	ND or <QL	28.4		53.6	F	*1.887	14		19.7	F	*1.407
08A-0028-D1AS	5.27	J	5.27	J	ND or <QL	9.96	J	9.96	J	ND or <QL	12.2	J	12.2	J	ND or <QL	130		245	F	*1.885	8.32		11.7	F	*1.406
08A-0028-D1BS	9.74	J	9.74	J	ND or <QL	20.3	J	20.3	J	ND or <QL	22.2	J	22.2	J	ND or <QL	217	J	409	JF	*1.885	21.6	J	30.4	JF	*1.407
08A-0028-D1CS	10.2	J	10.2	J	ND or <QL	22	J	22	J	ND or <QL	20.9	J	20.9	J	ND or <QL	311	J	587	JF	*1.887	22.6	J	31.8	JF	*1.407
08A-0028-D1DS	6.6	J	6.6	J	ND or <QL	13.9	J	13.9	J	ND or <QL	13.4	J	13.4	J	ND or <QL	186	J	351	JF	*1.887	13.3	J	18.7	JF	*1.406
08A-0028-D1DT	10.1	J	10.1	J	ND or <QL	22.8	J	22.8	J	ND or <QL	20.8	J	20.8	J	ND or <QL	267	J	504	JF	*1.888	19.1	J	26.9	JF	*1.408
08A-0028-D1ES	6	J	6	J	ND or <QL	13.6	J	13.6	J	ND or <QL	13.1	J	13.1	J	ND or <QL	107	J	202	JF	*1.888	9.58	J	13.5	JF	*1.409
08A-0029-C1AS	5.96	J	5.96	J	ND or <QL	15.6	J	15.6	J	ND or <QL	14.3	J	14.3	J	ND or <QL	552	J	1040	JF	*1.884	21.4	J	30.1	JF	*1.407
08A-0029-C1AT	18.8	J	18.8	J	ND or <QL	40.3	J	44.8	JF	*1.112	38.8	J	53.2	JF	*1.371	1570	J	2960	JF	*1.885	51.3	J	72.2	JF	*1.407
08A-0029-C1BS	22.9	J	25.2	JF	*1.100	61.7	J	68.5	JF	*1.110	48	J	65.8	JF	*1.371	6960	J	13100	JF	*1.882	133	J	187	JF	*1.406
08A-0029-C1CS	14.3	J	14.3	J	ND or <QL	49.4	J	54.9	JF	*1.111	38.4	J	52.6	JF	*1.370	7410	J	14000	JF	*1.889	179	J	252	JF	*1.408
08A-0029-C1CT	34.8	J	38.2	JF	*1.098	110	J	122	JF	*1.109	83.1	J	114	JF	*1.372	19700	J	37200	JF	*1.888	369	J	520	JF	*1.409
08A-0029-C1DS	19.9		21.9	F	*1.101	67.3		74.8	F	*1.111	41.8		57.3	F	*1.371	4790	J	9040	JF	*1.887	48.3	J	68	JF	*1.408
08A-0029-C1ES	28.9		31.8	F	*1.100	97.7		109	F	*1.116	52.6		72.1	F	*1.371	1740		3280	F	*1.885	32.9	J	46.3	JF	*1.407
08A-0029-C1FS	31.6		34.7	F	*1.098	163		181	F	*1.110	67.9		93	F	*1.370	8.97		16.9	F	*1.884	38.7	J	54.5	JF	*1.408
08A-0029-C1GS	6.83	J	6.83	J	ND or <QL	3.94	J	3.94	J	ND or <QL	6.08	J	6.08	J	ND or <QL	4.26		8.04	F	*1.887	18	J	25.3	JF	*1.406
08A-0030-C1AS	9.59	J	9.59	J	ND or <QL	19.4	J	19.4	J	ND or <QL	20	J	20	J	ND or <QL	407	J	768	JF	*1.887	22.7	J	32	JF	*1.410
08A-0030-C1BS	16.7	J	16.7	J	ND or <QL	37.9	J	42.1	JF	*1.111	45.4	J	62.2	JF	*1.370	512	J	966	JF	*1.887	13	J	18.3	JF	*1.408
08A-0030-C1CS	28.2	J	28.2	J	ND or <QL	50.4	J	56	JF	*1.111	61.6	J	84.4	JF	*1.370	10100	J	19100	JF	*1.891	58.1	J	81.8	JF	*1.408
08A-0030-C1DS	25.1	J	25.1	J	ND or <QL	62.6	J	69.5	JF	*1.110	53.6	J	73.4	JF	*1.369	9230	J	17400	JF	*1.885	58.9	J	82.9	JF	*1.407

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,7,8-PeCDF 57117-41-6 ng/kg					2,3,4,6,7,8-HxCDF 60851-34-5 ng/kg					2,3,4,7,8-PeCDF 57117-31-4 ng/kg					2,3,7,8-TCDD 1746-01-6 ng/kg					2,3,7,8-TCDF 51207-31-9 ng/kg				
	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0030-C1ES	12.2	J	12.2	J	ND or <QL	27.3	J	27.3	J	ND or <QL	30.4	J	30.4	J	ND or <QL	3950	J	7450	JF	*1.886	194	J	273	JF	*1.407
08A-0030-C1FS	2.27	J	2.27	J	ND or <QL	4.79	J	4.79	J	ND or <QL	3.82	J	3.82	J	ND or <QL	520		981	F	*1.887	< 1.91	U	< 1.91	U	ND or <QL
08A-0030-C1GS	< 0.113	U	< 0.113	U	ND or <QL	< 0.182	U	< 0.182	U	ND or <QL	< 0.130	U	< 0.130	U	ND or <QL	0.791	J	0.791	J	ND or <QL	< 2.20	U	< 2.20	U	ND or <QL
08A-0031-C1AS	6.92	J	6.92	J	ND or <QL	17.3	J	17.3	J	ND or <QL	14.9	J	14.9	J	ND or <QL	192	J	362	JF	*1.885	13.6	J	19.1	JF	*1.404
08A-0031-C1BS	17.4	J	17.4	J	ND or <QL	38.9	J	38.9	J	ND or <QL	43.3	J	43.3	J	ND or <QL	612	J	1150	JF	*1.879	32.5	J	45.8	JF	*1.409
08A-0031-C1CS	7.46	J	7.46	J	ND or <QL	16.2	J	16.2	J	ND or <QL	23.1	J	23.1	J	ND or <QL	410	J	774	JF	*1.888	28.4	J	40	JF	*1.408
08A-0031-C1DS	38.1	J	41.9	JF	*1.100	96.8	J	108	JF	*1.116	73	J	100	JF	*1.370	5460	J	10300	JF	*1.886	245	J	345	JF	*1.408
08A-0031-C1ES	16.9	J	16.9	J	ND or <QL	11	J	11	J	ND or <QL	12.8	J	12.8	J	ND or <QL	4.7		8.87	F	*1.887	17.5		24.6	F	*1.406
08A-0031-C1FS	< 0.156	U	< 0.156	U	ND or <QL	< 0.197	U	< 0.197	U	ND or <QL	< 0.155	U	< 0.155	U	ND or <QL	< 0.617	UJ	< 0.617	UJ	ND or <QL	< 0.500	U	< 0.500	U	ND or <QL
08A-0032-C2AS	4.3	J	4.3	J	ND or <QL	9.13	J	9.13	J	ND or <QL	8.13	J	8.13	J	ND or <QL	92.4	J	174	JF	*1.883	8.01	J	11.3	JF	*1.411
08A-0032-C2BS	6.29	J	6.29	J	ND or <QL	15.1	J	15.1	J	ND or <QL	13.9	J	13.9	J	ND or <QL	209	J	394	JF	*1.885	12.4	J	17.5	JF	*1.411
08A-0032-C2CS	13.2	J	13.2	J	ND or <QL	44.8	J	49.8	JF	*1.112	30.7	J	42.1	JF	*1.371	447	J	843	JF	*1.886	27.2	J	38.3	JF	*1.408
08A-0032-C2DS	34.8	J	38.2	JF	*1.098	71.4	J	79.3	JF	*1.111	71.5	J	98	JF	*1.371	4130	J	7790	JF	*1.886	93.7	J	132	JF	*1.409
08A-0032-C2ES	368	J	404	JF	*1.098	292	J	324	JF	*1.110	401	J	549	JF	*1.369	6610	J	12500	JF	*1.891	208	J	293	JF	*1.409
08A-0032-C2FS	4.01	J	4.01	J	ND or <QL	10.6	J	10.6	J	ND or <QL	8.67	J	8.67	J	ND or <QL	957	J	1810	JF	*1.891	30.2	J	42.5	JF	*1.407
08A-0032-C2GS	11.2	J	11.2	J	ND or <QL	31.9	J	31.9	J	ND or <QL	17.7	J	17.7	J	ND or <QL	1090		2060	F	*1.890	7.68	J	10.8	JF	*1.406
08A-0032-C2HS	4.2	J	4.2	J	ND or <QL	8.81	J	8.81	J	ND or <QL	8.04	J	8.04	J	ND or <QL	< 0.896	UJ	< 0.896	UJ	ND or <QL	4.7	J	6.62	JF	*1.409
08A-0032-C2IS	1.72	J	1.72	J	ND or <QL	2.8	J	2.8	J	ND or <QL	1.77	J	1.77	J	ND or <QL	2.52		4.76	F	*1.889	1.98		2.79	F	*1.409
08A-0033-C1AS	7.79	J	7.79	J	ND or <QL	16.7	J	16.7	J	ND or <QL	16.6	J	16.6	J	ND or <QL	171	J	323	JF	*1.889	15.7	J	22.1	JF	*1.408
08A-0033-C1BS	11	J	11	J	ND or <QL	25.8	J	28.7	JF	*1.112	24.9	J	34.1	JF	*1.369	239	J	451	JF	*1.887	23.1	J	32.5	JF	*1.407
08A-0033-C1CS	7.54	J	7.54	J	ND or <QL	16.6	J	16.6	J	ND or <QL	16.8	J	16.8	J	ND or <QL	163	J	308	JF	*1.890	11.8	J	16.6	JF	*1.407
08A-0033-C1DS	25.4	J	25.4	J	ND or <QL	48.1	J	53.4	JF	*1.110	56.6	J	77.5	JF	*1.369	533	J	1010	JF	*1.895	43.6	J	61.4	JF	*1.408
08A-0033-C1ES	14.6	J	14.6	J	ND or <QL	22.4	J	24.9	JF	*1.112	22.8	J	31.2	JF	*1.368	133	J	251	JF	*1.887	28.7	J	40.4	JF	*1.408
08A-0033-C1ET	6.94	J	6.94	J	ND or <QL	5.54	J	5.54	J	ND or <QL	8.14	J	8.14	J	ND or <QL	23	J	43.4	JF	*1.887	19.3	J	27.2	JF	*1.409
08A-0034-C1AS	3.52	J	3.52	J	ND or <QL	3.47	J	3.47	J	ND or <QL	7.6	J	7.6	J	ND or <QL	95.8		181	F	*1.889	8.39		11.8	F	*1.406
08A-0034-C1BS	8.05	J	8.05	J	ND or <QL	14.1	J	14.1	J	ND or <QL	15.2	J	15.2	J	ND or <QL	381		719	F	*1.887	13.9		19.6	F	*1.410
08A-0034-C1CS	11.7	J	11.7	J	ND or <QL	27.1		30.1	F	*1.111	41.6		57	F	*1.370	916		1730	F	*1.889	35.3	J	49.7	JF	*1.408
08A-0034-D2AS	2.99	J	2.99	J	ND or <QL	7.61	J	7.61	J	ND or <QL	6.62	J	6.62	J	ND or <QL	120		226	F	*1.883	8.44	J	11.9	JF	*1.410
08A-0034-D2BS	2.02	J	2.02	J	ND or <QL	3.64	J	3.64	J	ND or <QL	3.97	J	3.97	J	ND or <QL	68.1		129	F	*1.894	5.03		7.08	F	*1.408
08A-0034-D2CS	5.03	J	5.03	J	ND or <QL	9.33	J	9.33	J	ND or <QL	9.45	J	9.45	J	ND or <QL	148		279	F	*1.885	11.9		16.8	F	*1.412
08A-0034-D2DS	5.34	J	5.34	J	ND or <QL	10.7	J	10.7	J	ND or <QL	11.3	J	11.3	J	ND or <QL	137		259	F	*1.891	11.2	J	15.8	JF	*1.411
08A-0034-D2ES	4.92	J	4.92	J	ND or <QL	9.7	J	9.7	J	ND or <QL	13.6	J	13.6	J	ND or <QL	179		338	F	*1.888	14.5		20.4	F	*1.407
08A-0035-C5AS	1.29	J	1.29	J	ND or <QL	1.42	J	1.42	J	ND or <QL	5.55	J	5.55	J	ND or <QL	8.57		16.2	F	*1.890	< 2.02	U	< 2.02	U	ND or <QL
08A-0036-C2AS	2.28	J	2.28	J	ND or <QL	5.35	J	5.35	J	ND or <QL	4.81	J	4.81	J	ND or <QL	72.4		137	F	*1.892	4.89		6.89	F	*1.409
08A-0036-C2BS	1.08	J	1.08	J	ND or <QL	2.33	J	2.33	J	ND or <QL	3.43	J	3.43	J	ND or <QL	31		58.5	F	*1.887	2.68		3.77	F	*1.407
08A-0036-C2CS	11.4	J	11.4	J	ND or <QL	26.9		29.9	F	*1.112	23.4	J	32.1	JF	*1.372	1270		2400	F	*1.890	28.9		40.7	F	*1.408
08A-0036-C2DS	14.3	J	15.7	JF	*1.098	32.2		35.8	F	*1.112	28.6		39.2	F	*1.371	915		1730	F	*1.891	41.6		58.6	F	*1.409
08A-0036-C2ES	21.6	J	21.6	J	ND or <QL	31.3		34.8	F	*1.112	48.5		66.4	F	*1.369	3100		5850	F	*1.887	51.7		72.8	F	*1.408
08A-0036-C2ET	20.4	J	20.4	J	ND or <QL	43		47.8	F	*1.112	42.1		57.7	F	*1.371	2700		5090	F	*1.885	60.7		85.5	F	*1.409
08A-0036-C2FS	20.2		22.2	F	*1.099	35.9		39.9	F	*1.111	43.3		59.3	F	*1.370	2100		3960	F	*1.886	51.3		72.2	F	*1.407
08A-0036-C2GS	16.6	J	16.6	J	ND or <QL	45.1		50.1	F	*1.111	59.2		81.1	F	*1.370	46300		87400	F	*1.888	58.7		82.6	F	*1.407
08A-0037-C1AS	4.79	J	4.79	J	ND or <QL	9.91	J	9.91	J	ND or <QL	15.2	J	15.2	J	ND or <QL	138		260	F	*1.884	11.1		15.6	F	*1.405
08A-0037-C1BS	5.21	J	5.21	J	ND or <QL	7.86	J	7.86	J	ND or <QL	10.4	J	10.4	J	ND or <QL	132	J	249	JF	*1.886	8.42	J	11.9	JF	*1.413
08A-0037-C1CS	7.18	J	7.18	J	ND or <QL	12.8	J	12.8	J	ND or <QL	56.2		77	F	*1.370	340		642	F	*1.888	29.1	J	41	JF	*1.409
08A-0037-C1DS	5.78	J	5.78	J	ND or <QL	9.63	J	9.63	J	ND or <QL	13.9	J	13.9	J	ND or <QL	359		677	F	*1.886	14.7		20.7	F	*1.408
08A-0037-C1ES	5.59	J	5.59	J	ND or <QL	12.6	J	12.6	J	ND or <QL	10.7	J	10.7	J	ND or <QL	567		1070	F	*1.887	13.4		18.9	F	*1.410
08A-0038-C1AS	3.76	J	3.76	J	ND or <QL	4.96	J	4.96	J	ND or <QL	7.55	J	7.55	J	ND or <QL	113		213	F	*1.885	7.54		10.6	F	*1.406
08A-0038-C1BS	6.75	J	6.75	J	ND or <QL	9.55	J	9.55	J	ND or <QL	13.3	J	13.3	J	ND or <QL	284		536	F	*1.887	12.3	J	17.3	JF	*1.407
08A-0038-C1CS	9.51	J	9.51	J	ND or <QL	13.7	J	13.7	J	ND or <QL	18.3	J	18.3	J	ND or <QL	723		1360	F	*1.881	24.8		34.9	F	*1.407
08A-0038-C1DS	9.66	J	9.66	J	ND or <QL	12	J	12	J	ND or <QL	18.8	J	18.8	J	ND or <QL	677	J	1280	JF	*1.891	24.9	J	35.1	JF	*1.410
08A-0038-C1ES	26.6	J	16.8		Split-Replaced	33.6		34.1	B	Split-Replaced	40.5		38	B	Split-Replaced	1900		2250	B	Split-Replaced	57.2		51.7		Split-Replaced
08A-0038-C2FS	14.5	J	14.5	J	ND or <QL	39.3		43.7	F	*1.112	30.3		41.5	F	*1.370	1260		2380	F	*1.889	46.7		65.8	F	*1.409
08A-0038-C2GS	6.03	J	6.03	J	ND or <QL	9.79	J	9.79	J	ND or <QL	10.7	J	10.7	J	ND or <QL	57.3		108	F	*1.885	10.4	J	14.6	JF	*1.404

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,7,8-PeCDF 57117-41-6 ng/kg					2,3,4,6,7,8-HxCDF 60851-34-5 ng/kg					2,3,4,7,8-PeCDF 57117-31-4 ng/kg					2,3,7,8-TCDD 1746-01-6 ng/kg					2,3,7,8-TCDF 51207-31-9 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0039-C1AS	6.03	J	6.03	J	ND or <QL	12.2	J	12.2	J	ND or <QL	11.9	J	11.9	J	ND or <QL	129		243	F	*1.884	12.1		17	F	*1.405
08A-0039-C1BS	7.55	J	7.55	J	ND or <QL	13.8	J	13.8	J	ND or <QL	13.5	J	13.5	J	ND or <QL	148	J	279	JF	*1.885	17	J	23.9	JF	*1.406
08A-0039-C1CS	7.18	J	7.18	J	ND or <QL	9.36	J	9.36	J	ND or <QL	16	J	16	J	ND or <QL	189		357	F	*1.889	15.9	J	22.4	JF	*1.409
08A-0039-C1DS	10.6	J	10.6	J	ND or <QL	23.6	J	23.6	J	ND or <QL	52.1		71.4	F	*1.370	590		1110	F	*1.881	51.4		72.4	F	*1.409
08A-0039-C1ES	7.61	J	7.61	J	ND or <QL	18.2	J	18.2	J	ND or <QL	14.6	J	14.6	J	ND or <QL	701		1320	F	*1.883	24.4		34.4	F	*1.410
08A-0039-C1FS	23.9	J	23.9	J	ND or <QL	80.3	J	89.2	JF	*1.111	46.5	J	63.7	JF	*1.370	2980	J	5620	JF	*1.886	234	J	329	JF	*1.406
08A-0039-C1GS	15.8	J	15.8	J	ND or <QL	83.2		92.4	F	*1.111	28.5		39	F	*1.368	222		419	F	*1.887	28.1	J	39.6	JF	*1.409
08A-0039-C1HS	19.8	J	19.8	J	ND or <QL	97.3	J	108	JF	*1.110	36.3	J	49.7	JF	*1.369	18.9	J	35.7	JF	*1.889	29.1	J	41	JF	*1.409
08A-0040-C1AS	9.65	J	9.65	J	ND or <QL	22.4	J	22.4	J	ND or <QL	20.7	J	20.7	J	ND or <QL	723		1360	F	*1.881	34.8		49	F	*1.408
08A-0040-C1BS	22.5		24.7	F	*1.098	67.6		75.1	F	*1.111	58.1		79.6	F	*1.370	4190		7910	F	*1.888	159		224	F	*1.409
08A-0040-C1CS	23.7	J	23.7	J	ND or <QL	75.5		83.9	F	*1.111	48.4		66.3	F	*1.370	19100		36000	F	*1.885	163	J	230	JF	*1.411
08A-0040-C1CT	24.7		27.1	F	*1.097	72		80	F	*1.111	48.7		66.7	F	*1.370	14900		28100	F	*1.886	165	J	232	JF	*1.406
08A-0040-C1DS	19.2	J	19.2	J	ND or <QL	78.5		87.2	F	*1.111	34.1		46.7	F	*1.370	1460		2760	F	*1.890	30.6	J	43.1	JF	*1.408
08A-0040-C1ES	10.2	J	10.2	J	ND or <QL	42.1		46.8	F	*1.112	18	J	18	J	ND or <QL	24.7	J	46.6	JF	*1.887	15.4	J	21.7	JF	*1.409
08A-0040-C1ET	7.12	J	7.12	J	ND or <QL	28.5		31.7	F	*1.112	11.4	J	11.4	J	ND or <QL	16.1	J	30.4	JF	*1.888	11.5	J	16.2	JF	*1.409
08A-0041-C1AS	9.57	J	9.57	J	ND or <QL	21.8	J	21.8	J	ND or <QL	17.6	J	17.6	J	ND or <QL	203	J	383	JF	*1.887	16.4	J	23.1	JF	*1.409
08A-0041-C1BS	6.99	J	6.99	J	ND or <QL	49.1	J	54.6	JF	*1.112	11.5	J	11.5	J	ND or <QL	105		198	F	*1.886	10.9		15.3	F	*1.404
08A-0041-C1CS	3.62	J	3.62	J	ND or <QL	8.08	J	8.08	J	ND or <QL	10.7	J	10.7	J	ND or <QL	141		266	F	*1.887	13		18.3	F	*1.408
08A-0041-C1DS	24.1	J	24.1	J	ND or <QL	75.1	J	83.4	JF	*1.111	64.4	J	88.2	JF	*1.370	25900	J	48900	JF	*1.888	137	J	193	JF	*1.409
08A-0041-C1DT	10.7	J	10.7	J	ND or <QL	32	J	32	J	ND or <QL	28.6	J	28.6	J	ND or <QL	4280	J	8080	JF	*1.888	52.6	J	74.1	JF	*1.409
08A-0041-C1ES	1.08	J	1.08	J	ND or <QL	3.83	J	3.83	J	ND or <QL	2.23	J	2.23	J	ND or <QL	247		466	F	*1.887	2.2		3.1	F	*1.409
08A-0042-C2AS	16.1	J	16.1	J	ND or <QL	30.2	J	30.2	J	ND or <QL	27.8	J	27.8	J	ND or <QL	323	J	610	JF	*1.889	30.5	J	42.9	JF	*1.407
08A-0042-C2BS	1.78	J	1.78	J	ND or <QL	3.32	J	3.32	J	ND or <QL	2.84	J	2.84	J	ND or <QL	25	J	47.2	JF	*1.888	2.63	J	3.7	JF	*1.407
08A-0042-C2CS	18.7	J	18.7	J	ND or <QL	43.1	J	47.9	JF	*1.111	41.5	J	56.9	JF	*1.371	551	J	1040	JF	*1.887	35.8	J	50.4	JF	*1.408
08A-0042-C2DS	9.54	J	9.54	J	ND or <QL	20.1		22.3	F	*1.109	26.6		36.4	F	*1.368	679		1280	F	*1.885	26.4	J	37.2	JF	*1.409
08A-0042-C2ES	46.9	J	51.5	JF	*1.098	126	J	140	JF	*1.111	91.6	J	125	JF	*1.365	15000	J	28300	JF	*1.887	129	J	182	JF	*1.411
08A-0043-C2AS	10.7	J	10.7	J	ND or <QL	19.7	J	19.7	J	ND or <QL	20.8	J	20.8	J	ND or <QL	1310	J	2470	JF	*1.885	24.9	J	35.1	JF	*1.410
08A-0043-C2BS	2.1	J	12		Split-Replaced	1.95	J	19.6	B	Split-Replaced	14.4	J	94.1	B	Split-Replaced	102		768		Split-Replaced	10.2		72.8		Split-Replaced
08A-0043-C2CS	43.3	J	43.5		Split-Replaced	43.3	J	44.9	B	Split-Replaced	753	J	734	B	Split-Replaced	926	J	1010		Split-Replaced	406	J	413		Split-Replaced
08A-0043-C2DS	12.3	J	12.3	J	ND or <QL	18.2	J	18.2	J	ND or <QL	138	J	189	JF	*1.370	240	J	453	JF	*1.888	80.1	J	113	JF	*1.411
08A-0044-C1AS	8.23	J	8.23	J	ND or <QL	19	J	19	J	ND or <QL	15.4	J	15.4	J	ND or <QL	217	J	409	JF	*1.885	15.1	J	21.3	JF	*1.411
08A-0044-C1BS	9.92	J	9.92	J	ND or <QL	12.6	J	12.6	J	ND or <QL	20.4	J	20.4	J	ND or <QL	419		791	F	*1.888	22.4		31.5	F	*1.406
08A-0044-C1CS	3.34	J	3.34	J	ND or <QL	2.46	J	2.46	J	ND or <QL	4.95	J	4.95	J	ND or <QL	102		192	F	*1.882	8.01		11.3	F	*1.411
08A-0044-C1DS	0.416	J	0.416	J	ND or <QL	0.27	J	0.27	J	ND or <QL	0.473	J	0.473	J	ND or <QL	1.3	J	1.3	J	ND or <QL	1.81		2.55	F	*1.409
08A-0044-C1ES	0.346	J	0.346	J	ND or <QL	< 0.0841	U	< 0.0841	U	ND or <QL	0.385	J	0.385	J	ND or <QL	0.538	J	0.538	J	ND or <QL	1.14	J	1.14	J	ND or <QL
08A-0045-C2AS	30.9	J	30.9	J	ND or <QL	44.8	J	49.8	JF	*1.112	57.2	J	78.4	JF	*1.371	7130	J	13500	JF	*1.893	73.3	J	103	JF	*1.405
08A-0045-C2BS	72.1	J	79.2	JF	*1.098	164	J	182	JF	*1.110	198	J	271	JF	*1.369	26700	J	50400	JF	*1.888	275	J	387	JF	*1.407
08A-0045-C2CS	23.1	J	23.1	J	ND or <QL	61.9	J	68.8	JF	*1.111	45.8	J	62.7	JF	*1.369	5360	J	10100	JF	*1.884	68.5	J	96.4	JF	*1.407
08A-0045-C2DS	31.4		34.5	F	*1.099	64		71.1	F	*1.111	53.4		73.2	F	*1.371	752		1420	F	*1.888	41.7	J	58.7	JF	*1.408
08A-0045-C2ES	22.1	J	22.1	J	ND or <QL	133		148	F	*1.113	46.6		63.8	F	*1.369	8.01		15.1	F	*1.885	37.9	J	53.4	JF	*1.409
08A-0045-C2FS	19.7		21.7	F	*1.102	40.1		44.6	F	*1.112	21.4		29.3	F	*1.369	3.45	J	6.51	JF	*1.887	16.4	J	23.1	JF	*1.409
08A-0045-C2FT	20.3	J	20.3	J	ND or <QL	44.3		49.2	F	*1.111	21.9	J	21.9	J	ND or <QL	8.07	J	15.2	JF	*1.884	19.8	J	27.9	JF	*1.409
08A-0045-C2GS	13.5	J	13.5	J	ND or <QL	5.77	J	5.77	J	ND or <QL	8.45	J	8.45	J	ND or <QL	0.983	J	0.983	J	ND or <QL	16	J	22.5	JF	*1.406
08A-0045-C2HS	8.75	J	8.75	J	ND or <QL	7.35	J	7.35	J	ND or <QL	9.64	J	9.64	J	ND or <QL	0.914	J	0.914	J	ND or <QL	15.8	J	22.2	JF	*1.405
08A-0045-C2IS	6.16	J	6.16	J	ND or <QL	5.71	J	5.71	J	ND or <QL	7.84	J	7.84	J	ND or <QL	0.616	J	0.616	J	ND or <QL	12	J	16.9	JF	*1.408
08A-0046-C2AS	0.677	J	0.677	J	ND or <QL	1.27	J	1.27	J	ND or <QL	0.966	J	0.966	J	ND or <QL	10.8		20.4	F	*1.889	< 0.944	U	< 0.944	U	ND or <QL
08A-0047-C1AS	7.87	J	7.87	J	ND or <QL	15.6	J	15.6	J	ND or <QL	15.9	J	15.9	J	ND or <QL	190	J	359	JF	*1.889	16.5	J	23.2	JF	*1.406
08A-0047-C1BS	1.67	J	1.67	J	ND or <QL	5.6	J	5.6	J	ND or <QL	4.55	J	4.55	J	ND or <QL	45.4		85.7	F	*1.888	5.06		7.12	F	*1.407
08A-0047-C1CS	1.17	J	1.17	J	ND or <QL	2.54	J	2.54	J	ND or <QL	2.27	J	2.27	J	ND or <QL	75.5		142	F	*1.881	3.58		5.04	F	*1.408
08A-0047-C1DS	6.9	J	6.9	J	ND or <QL	4.45	J	4.45	J	ND or <QL	6.58	J	6.58	J	ND or <QL	0.877		1.65	F	*1.881	15.8		22.2	F	*1.405
08A-0047-C1ES	0.705	J	0.705	J	ND or <QL	0.375	J	0.375	J	ND or <QL	0.673	J	0.673	J	ND or <QL	1.59		3	F	*1.887	2.26		3.18	F	*1.407
08A-0047-D4AS	2.63	J	2.63	J	ND or <QL	6.6	J	6.6	J	ND or <QL	5.67	J	5.67	J	ND or <QL	85.3		161	F	*1.887	7.75		10.9	F	*1.406
08A-0047-D4BS	2.2	J	2.2	J	ND or <QL	5.69	J	5.69	J	ND or <QL	4.65	J	4.65	J	ND or <QL	70.8		134	F	*1.893	7.4		10.4	F	*1.405

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,7,8-PeCDF 57117-41-6 ng/kg					2,3,4,6,7,8-HxCDF 60851-34-5 ng/kg					2,3,4,7,8-PeCDF 57117-31-4 ng/kg					2,3,7,8-TCDD 1746-01-6 ng/kg					2,3,7,8-TCDF 51207-31-9 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0047-D4CS	2.7	J	2.7	J	ND or <QL	5.19	J	5.19	J	ND or <QL	4.28	J	4.28	J	ND or <QL	45.6		86	F	*1.886	5.32		7.49	F	*1.408
08A-0047-D4DS	1.15	J	1.15	J	ND or <QL	2.81	J	2.81	J	ND or <QL	2.3	J	2.3	J	ND or <QL	33.9		64	F	*1.888	3.36		4.73	F	*1.408
08A-0047-D4ES	1.97	J	1.97	J	ND or <QL	4.65	J	4.65	J	ND or <QL	4.97	J	4.97	J	ND or <QL	101		191	F	*1.891	6.16		8.67	F	*1.407
08A-0048-C2AS	1.84	J	1.84	J	ND or <QL	2.61	J	2.61	J	ND or <QL	2.75	J	2.75	J	ND or <QL	32.3	J	61	JF	*1.889	3.64	J	5.13	JF	*1.409
08A-0048-C2BS	3.68	J	3.68	J	ND or <QL	1.06	J	1.06	J	ND or <QL	3.11	J	3.11	J	ND or <QL	0.57	J	0.57	J	ND or <QL	9.19		12.9	F	*1.404
08A-0048-C2CS	2.46	J	2.46	J	ND or <QL	0.974	J	0.974	J	ND or <QL	2.23	J	2.23	J	ND or <QL	< 0.191	UJ	< 0.191	UJ	ND or <QL	7.88	J	11.1	JF	*1.409
08A-0048-C2DS	< 0.0626	U	< 0.0626	U	ND or <QL	< 0.121	U	< 0.121	U	ND or <QL	< 0.0611	U	< 0.0611	U	ND or <QL	< 0.236	U	< 0.236	U	ND or <QL	< 0.212	U	< 0.212	U	ND or <QL
08A-0048-C2ES	< 0.123	U	< 0.123	U	ND or <QL	< 0.145	U	< 0.145	U	ND or <QL	< 0.115	U	< 0.115	U	ND or <QL	< 0.208	U	< 0.208	U	ND or <QL	< 0.200	U	< 0.200	U	ND or <QL
08A-0049-C1AS	0.711	J	0.711	J	ND or <QL	1.47	J	1.47	J	ND or <QL	1.41	J	1.41	J	ND or <QL	18.1		34.2	F	*1.890	< 1.43	U	< 1.43	U	ND or <QL
08A-0049-C1BS	1.75	J	1.75	J	ND or <QL	3.75	J	3.75	J	ND or <QL	3.03	J	3.03	J	ND or <QL	31.8		60	F	*1.887	2.27	J	3.2	JF	*1.410
08A-0049-C1CS	1.68	J	1.68	J	ND or <QL	2.72	J	2.72	J	ND or <QL	3.62	J	3.62	J	ND or <QL	37.4		70.6	F	*1.888	3.95		5.56	F	*1.408
08A-0049-C1DS	1.45	J	1.45	J	ND or <QL	1.95	J	1.95	J	ND or <QL	3.08	J	3.08	J	ND or <QL	57		108	F	*1.895	4.25		5.98	F	*1.407
08A-0049-C2ES	1.67	J	1.67	J	ND or <QL	1.9	J	1.9	J	ND or <QL	3.19	J	3.19	J	ND or <QL	60.2		114	F	*1.894	4.53	J	6.38	JF	*1.408
08A-0050-C1AS	2.92	J	2.92	J	ND or <QL	5.46	J	5.46	J	ND or <QL	5.32	J	5.32	J	ND or <QL	59.2	J	112	JF	*1.892	7.12	J	10	JF	*1.404
08A-0050-C1BS	4.73	J	8.6		Split-Replaced	7.48	J	16.6	EZ	Split-Replaced	9.37	J	15.9	B	Split-Replaced	223		584		Split-Replaced	19.5		37.4		Split-Replaced
08A-0050-C1CS	5.92	J	7.25	EZ	Split-Replaced	11.9	J	15.1	B	Split-Replaced	11.4	J	14.2	B	Split-Replaced	523		1890		Split-Replaced	45.1		60.5		Split-Replaced
08A-0050-C1DS	< 0.105	U	< 0.105	U	ND or <QL	< 0.131	U	< 0.131	U	ND or <QL	< 0.106	U	< 0.106	U	ND or <QL	< 0.353	UJ	< 0.353	UJ	ND or <QL	< 0.113	U	< 0.113	U	ND or <QL
08A-0051-C1AS	1.65	J	1.65	J	ND or <QL	3.42	J	3.42	J	ND or <QL	2.72	J	2.72	J	ND or <QL	33.7		63.6	F	*1.887	2.88		4.06	F	*1.410
08A-0051-C1BS	0.269	J	0.346	J	Split-Replaced	0.599	J	< 0.704	U	Split-Replaced	0.449	J	< 0.842	U	Split-Replaced	6.89		12.7	E	Split-Replaced	< 0.524	U	0.878	EZ	Split-Replaced
08A-0051-C2CS	0.508	J	0.79	EZ	Split-Replaced	1.07	J	< 1.53	U	Split-Replaced	0.844	J	1.66	BJ	Split-Replaced	7.32		13.9		Split-Replaced	0.867	J	1.09	EZ	Split-Replaced
08A-0052-C2AS	< 1.11	U	< 1.11	U	ND or <QL	2.06	J	2.06	J	ND or <QL	2.27	J	2.27	J	ND or <QL	31.5		59.4	F	*1.886	2.48		3.49	F	*1.407
08A-0054-C3AS	< 0.0938	UJ	< 0.0938	UJ	ND or <QL	0.191	J	0.191	J	ND or <QL	0.213	J	0.213	J	ND or <QL	2.78		5.25	F	*1.888	< 0.852	U	< 0.852	U	ND or <QL
08A-0054-C3BS	< 0.0373	U	< 0.0373	U	ND or <QL	< 0.0407	U	< 0.0407	U	ND or <QL	< 0.0366	U	< 0.0366	U	ND or <QL	< 0.0241	U	< 0.0241	U	ND or <QL	< 0.0227	U	< 0.0227	U	ND or <QL
08A-0054-C3CS	< 0.0195	U	< 0.0195	U	ND or <QL	0.0377	J	0.0377	J	ND or <QL	< 0.0191	U	< 0.0191	U	ND or <QL	< 0.0243	U	< 0.0243	U	ND or <QL	< 0.0348	U	< 0.0348	U	ND or <QL
08A-0055-C2AS	12.7	J	12.7	J	ND or <QL	26.4	J	26.4	J	ND or <QL	26.4	J	26.4	J	ND or <QL	475	J	896	JF	*1.886	27.6	J	38.9	JF	*1.409
08A-0055-C2BS	6.38	J	6.38	J	ND or <QL	10.6	J	10.6	J	ND or <QL	11.7	J	11.7	J	ND or <QL	724		1370	F	*1.892	11.8		16.6	F	*1.407
08A-0055-C2CS	< 0.169	U	< 0.169	U	ND or <QL	< 0.164	U	< 0.164	U	ND or <QL	< 0.151	U	< 0.151	U	ND or <QL	< 0.386	U	< 0.386	U	ND or <QL	< 0.460	U	< 0.460	U	ND or <QL
08A-0055-C2DS	< 0.124	U	< 0.124	U	ND or <QL	< 0.146	U	< 0.146	U	ND or <QL	< 0.125	U	< 0.125	U	ND or <QL	< 0.268	U	< 0.268	U	ND or <QL	< 0.297	U	< 0.297	U	ND or <QL
08A-0055-C2ES	< 0.134	U	< 0.134	U	ND or <QL	< 0.145	U	< 0.145	U	ND or <QL	< 0.123	U	< 0.123	U	ND or <QL	< 0.263	U	< 0.263	U	ND or <QL	< 0.302	U	< 0.302	U	ND or <QL
08A-0055-C2FS	< 0.184	U	< 0.184	U	ND or <QL	< 0.202	U	< 0.202	U	ND or <QL	< 0.177	U	< 0.177	U	ND or <QL	< 0.373	U	< 0.373	U	ND or <QL	< 0.476	U	< 0.476	U	ND or <QL
08A-0056-C2AS	< 4.56	UJ	< 4.56	UJ	ND or <QL	10.5	J	10.5	J	ND or <QL	9	J	9	J	ND or <QL	131	J	247	JF	*1.885	12.2	J	17.2	JF	*1.410
08A-0056-C2BS	< 2.52	UJ	< 2.52	UJ	ND or <QL	5.49	J	5.49	J	ND or <QL	5.34	J	5.34	J	ND or <QL	66.8		126	F	*1.886	9.89		13.9	F	*1.405
08A-0056-C2CS	< 3.17	U	< 3.17	U	ND or <QL	7.41	J	7.41	J	ND or <QL	6.27	J	6.27	J	ND or <QL	193		364	F	*1.886	9.53		13.4	F	*1.406
08A-0056-C2DS	14.1	J	14.1	J	ND or <QL	19.5		21.7	F	*1.113	27.2		37.3	F	*1.371	1370		2590	F	*1.891	39.2	J	55.2	JF	*1.408
08A-0056-C2ES	45	J	49.5	JF	*1.100	36	J	40	JF	*1.111	59.1	J	81	JF	*1.371	4450	J	8400	JF	*1.888	81.4	J	115	JF	*1.413
08A-0056-C2FS	51.4	J	56.5	JF	*1.099	109	J	121	JF	*1.110	96.7	J	132	JF	*1.365	8300	J	15700	JF	*1.892	162	J	228	JF	*

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,7,8-PeCDF 57117-41-6 ng/kg					2,3,4,6,7,8-HxCDF 60851-34-5 ng/kg					2,3,4,7,8-PeCDF 57117-31-4 ng/kg					2,3,7,8-TCDD 1746-01-6 ng/kg					2,3,7,8-TCDF 51207-31-9 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0058-C1FS	1.17	J	1.17	J	ND or <QL	< 0.166	U	< 0.166	U	ND or <QL	0.917	J	0.917	J	ND or <QL	< 0.169	U	< 0.169	U	ND or <QL	3.52		4.96	F	*1.409
08A-0060-C1AS	6.4	J	6.4	J	ND or <QL	11.6	J	11.6	J	ND or <QL	12.8	J	12.8	J	ND or <QL	164	J	309	JF	*1.884	15.7	J	22.1	JF	*1.408
08A-0060-C1BS	3.91	J	3.91	J	ND or <QL	7.28	J	7.28	J	ND or <QL	7.82	J	7.82	J	ND or <QL	262	J	494	JF	*1.885	8.04	J	11.3	JF	*1.405
08A-0060-C1CS	20.4	J	20.4	J	ND or <QL	38.9	J	43.2	JF	*1.111	33.9	J	33.9	J	ND or <QL	455	J	859	JF	*1.888	37	J	52.1	JF	*1.408
08A-0060-C1DS	18.1	J	18.1	J	ND or <QL	30.3	J	30.3	J	ND or <QL	30.5	J	30.5	J	ND or <QL	1350	J	2550	JF	*1.889	28.9	J	40.7	JF	*1.408
08A-0060-C1ES	2.86	J	2.86	J	ND or <QL	6.21	J	6.21	J	ND or <QL	5.5	J	5.5	J	ND or <QL	94.2		178	F	*1.890	5.42	J	7.63	JF	*1.408
08A-0060-C1FS	< 0.222	U	< 0.222	U	ND or <QL	< 0.131	U	< 0.131	U	ND or <QL	< 0.201	U	< 0.201	U	ND or <QL	< 0.208	U	< 0.208	U	ND or <QL	< 0.223	U	< 0.223	U	ND or <QL
08A-0060-C1GS	< 0.273	U	< 0.273	U	ND or <QL	0.564	J	0.564	J	ND or <QL	< 0.264	U	< 0.264	U	ND or <QL	< 0.169	U	< 0.169	U	ND or <QL	< 0.181	U	< 0.181	U	ND or <QL
08A-0061-C1AS	2.2	J	2.2	J	ND or <QL	3.8	J	3.8	J	ND or <QL	4.24	J	4.24	J	ND or <QL	52.2		98.5	F	*1.887	6.46		9.1	F	*1.409
08A-0061-C1BS	0.659	J	0.659	J	ND or <QL	0.867	J	0.867	J	ND or <QL	1.05	J	1.05	J	ND or <QL	11		20.8	F	*1.891	< 1.00	U	< 1.00	U	ND or <QL
08A-0061-C1CS	0.507	J	0.507	J	ND or <QL	0.382	J	0.382	J	ND or <QL	0.931	J	0.931	J	ND or <QL	19.7		37.2	F	*1.888	1.57	J	1.57	J	ND or <QL
08A-0061-C1DS	1.08	J	1.08	J	ND or <QL	0.555	J	0.555	J	ND or <QL	1.47	J	1.47	J	ND or <QL	30.3		57.2	F	*1.888	2.83		3.98	F	*1.406
08A-0061-C1ES	< 0.187	U	< 0.187	U	ND or <QL	< 0.133	U	< 0.133	U	ND or <QL	< 0.138	U	< 0.138	U	ND or <QL	< 0.0836	U	< 0.0836	U	ND or <QL	< 0.118	U	< 0.118	U	ND or <QL
08A-0062-C1AS	7.47	J	7.47	J	ND or <QL	33.7	J	33.7	J	ND or <QL	14.1	J	14.1	J	ND or <QL	15.5	J	29.2	JF	*1.884	13.5	J	19	JF	*1.407
08A-0062-C1BS	26.2	J	26.2	J	ND or <QL	184	J	204	JF	*1.109	63	J	86.3	JF	*1.370	5.11	J	9.64	JF	*1.886	54.1	J	76.2	JF	*1.409
08A-0062-C1CS	34.7	J	38.1	JF	*1.098	229	J	254	JF	*1.109	83.2	J	114	JF	*1.370	5.46	J	10.3	JF	*1.886	34.6	J	48.7	JF	*1.408
08A-0062-C1DS	3.78	J	3.78	J	ND or <QL	17.5	J	17.5	J	ND or <QL	6.71	J	6.71	J	ND or <QL	0.416	J	0.416	J	ND or <QL	3.84	J	5.41	JF	*1.409
08A-0062-C1ES	21.7	J	31		Split-Replaced	37.4		25.5	B	Split-Replaced	19.5	J	29.7	B	Split-Replaced	0.785	J	3.07		Split-Replaced	13.9	J	25.8		Split-Replaced
08A-0062-C1FS	15	J	11.9		Split-Replaced	11.1	J	5.79	BJ	Split-Replaced	9.44	J	7.84	BJ	Split-Replaced	0.699	J	0.816	EZ	Split-Replaced	23.9		22.2		Split-Replaced
08A-0062-C1GS	0.245	J	0.629	EZ	Split-Replaced	0.323	J	< 0.646	U	Split-Replaced	0.274	J	< 0.489	U	Split-Replaced	< 0.0784	U	0.212	EZ	Split-Replaced	< 1.03	U	1.42	J	Split-Replaced
08A-0062-C1HS	0.197	J	0.197	J	ND or <QL	< 0.0489	U	< 0.0489	U	ND or <QL	0.247	J	0.247	J	ND or <QL	< 0.0432	U	< 0.0432	U	ND or <QL	< 0.782	U	< 0.782	U	ND or <QL
08A-0062-D1AS	2.12	J	2.12	J	ND or <QL	5.17	J	5.17	J	ND or <QL	4.65	J	4.65	J	ND or <QL	65.7	J	124	JF	*1.887	< 7.91	UJ	< 7.91	UJ	ND or <QL
08A-0062-D1BS	2.4	J	2.4	J	ND or <QL	6.44	J	6.44	J	ND or <QL	6.55	J	6.55	J	ND or <QL	92.9	J	175	JF	*1.884	7.09	J	9.98	JF	*1.408
08A-0062-D1CS	9.68	J	9.68	J	ND or <QL	21.3	J	21.3	J	ND or <QL	19.5	J	19.5	J	ND or <QL	310	J	585	JF	*1.887	23.4	J	32.9	JF	*1.406
08A-0062-D1DS	6.35	J	6.35	J	ND or <QL	36.6	J	40.7	JF	*1.112	13.9	J	13.9	J	ND or <QL	10.4	J	19.6	JF	*1.885	15.2	J	21.4	JF	*1.408
08A-0062-D1ES	31.2	J	31.2	J	ND or <QL	213	J	237	JF	*1.113	72.6	J	99.5	JF	*1.371	4.17	J	7.87	JF	*1.887	54.5	J	76.7	JF	*1.407
08A-0062-D1ET	28.6	J	28.6	J	ND or <QL	200	J	222	JF	*1.110	68	J	93.2	JF	*1.371	3.98	J	7.51	JF	*1.887	52.9	J	74.5	JF	*1.408
08A-0063-C1AS	21.1	J	21.1	J	ND or <QL	21.3	J	21.3	J	ND or <QL	19.7	J	19.7	J	ND or <QL	447	J	843	JF	*1.886	25.8	J	36.3	JF	*1.407
08A-0063-C1BS	22.3	J	22.3	J	ND or <QL	45.7	J	45.7	J	ND or <QL	42.1	J	42.1	J	ND or <QL	632	J	1190	JF	*1.883	41.8	J	58.9	JF	*1.409
08A-0063-C1CS	18.5	J	18.5	J	ND or <QL	32.5	J	32.5	J	ND or <QL	38.9	J	53.3	JF	*1.370	495	J	934	JF	*1.887	106	J	149	JF	*1.406
08A-0063-C1DS	0.69	J	0.69	J	ND or <QL	1.32	J	1.32	J	ND or <QL	2.23	J	2.23	J	ND or <QL	25		47.2	F	*1.888	2.27		3.2	F	*1.410
08A-0064-C1AS	4.27	J	4.27	J	ND or <QL	11.2	J	11.2	J	ND or <QL	8.15	J	8.15	J	ND or <QL	114	J	215	JF	*1.886	13.8	J	19.4	JF	*1.406
08A-0064-C1BS	0.176	J	0.176	J	ND or <QL	0.37	J	0.37	J	ND or <QL	0.288	J	0.288	J	ND or <QL	4.14		7.81	F	*1.886	< 0.416	U	< 0.416	U	ND or <QL
08A-0064-C1BT	0.255	J	0.255	J	ND or <QL	0.637	J	0.637	J	ND or <QL	0.405	J	0.405	J	ND or <QL	4.46		8.42	F	*1.888	0.302	J	0.302	J	ND or <QL
08A-0064-C1CS	0.125	J	0.125	J	ND or <QL	< 0.0253	U	< 0.0253	U	ND or <QL	< 0.0933	UJ	< 0.0933	UJ	ND or <QL	< 0.0132	U	< 0.0132	U	ND or <QL	< 0.378	U	< 0.378	U	ND or <QL
08A-0065-C3AS	< 5.36	UJ	< 5.36	UJ	ND or <QL	9.92	J	9.92	J	ND or <QL	9.48	J	9.48	J	ND or <QL	155	J	292	JF	*1.884	14.3	J	20.1	JF	*1.406
08A-0065-C3BS	7.78	J	7.78	J	ND or <QL	17.3		19.2	F	*1.110	22.4		30.7	F	*1.371	249		470	F	*1.888	24.8		34.9	F	*1.407
08A-0065-C3CS	< 0.0440	U	< 0.0440	U	ND or <QL	< 0.0962	U	< 0.0962	U	ND or <QL	< 0.0499	UJ	< 0.0499	UJ	ND or <QL	1.27		2.4	F	*1.890	< 0.718	U	< 0.718	U	ND or <QL
08A-0065-C3DS	< 0.0289	U	< 0.0289	U	ND or <QL	< 0.0408	U	< 0.0408	U	ND or <QL	< 0.0289	U	< 0.0289	U	ND or <QL	< 0.337	UJ	< 0.337	UJ	ND or <QL	< 0.0560	U	< 0.0560	U	ND or <QL
08A-0065-C3ES	< 0.112	U	< 0.112	U	ND or <QL	< 0.128	U	< 0.128	U	ND or <QL	< 0.106	U	< 0.106	U	ND or <QL	< 0.259	UJ	< 0.259	UJ	ND or <QL	< 0.168	U	< 0.168	U	ND or <QL
08A-0065-C3ET	< 0.127	U	< 0.127	U	ND or <QL	< 0.102	U	< 0.102	U	ND or <QL	< 0.140	U	< 0.140	U	ND or <QL	< 0.245	UJ	< 0.245	UJ	ND or <QL	< 0.0388	U	< 0.0388	U	ND or <QL
08A-0065-C3FS	0.213	J	0.213	J	ND or <QL	0.346	J	0.346	J	ND or <QL	< 0.280	U	< 0.280	U	ND or <QL	< 0.110	U	< 0.110	U	ND or <QL	< 1.21	U	< 1.21	U	ND or <QL
08A-0065-C3GS	< 0.0866	U	< 0.0866	U	ND or <QL	< 0.0817	U	< 0.0817	U	ND or <QL	< 0.0883	U	< 0.0883	U	ND or <QL	< 0.113	U	< 0.113	U	ND or <QL	< 0.150	U	< 0.150	U	ND or <QL
08A-0065-C3HS	< 0.0939	U	< 0.0939	U	ND or <QL	< 0.0688	U	< 0.0688	U	ND or <QL	< 0.0912	U	< 0.0912	U	ND or <QL	< 0.103	U	< 0.103	U	ND or <QL	< 0.171	U	< 0.171	U	ND or <QL
08A-0065-C3IS	< 0.0716	U	< 0.0716	U	ND or <QL	< 0.0781	U	< 0.0781	U	ND or <QL	< 0.0716	U	< 0.0716	U	ND or <QL	< 0.0948	U	< 0.0948	U	ND or <QL	< 0.115	U	< 0.115	U	ND or <QL
08A-0066-C1AS	0.47	J	0.47	J	ND or <QL	1.28	J	1.28	J	ND or <QL	1.21	J	1.21	J	ND or <QL	25.8	J	48.7	JF	*1.888	2.29	J	3.22	JF	*1.406
08A-0066-C1AT	0.34	J	0.34	J	ND or <QL	2.6	J	2.6	J	ND or <QL	1.05	J	1.05	J	ND or <QL	7.34	J	13.9	JF	*1.894	< 0.808	UJ	< 0.808	UJ	ND or <QL
08A-0066-C1BS	0.458	J	0.458	J	ND or <QL	1.43	J	1.43	J	ND or <QL	1.05	J	1.05	J	ND or <QL	12		22.6	F	*1.883	1.82	J	1.82	J	ND or <QL
08A-0066-C1CS	0.735	J	0.735	J	ND or <QL	1.43	J	1.43	J	ND or <QL	1.09	J	1.09	J	ND or <QL	20.3		38.3	F	*1.887	2.27		3.2	F	*1.410
08A-0066-C1DS	0.955	J	0.955	J	ND or <QL	1.02	J	1.02	J	ND or <QL	0.842	J	0.842	J	ND or <QL	17.9		33.8	F	*1.888	3.53	J	4.97	JF	*

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,7,8-PeCDF 57117-41-6 ng/kg					2,3,4,6,7,8-HxCDF 60851-34-5 ng/kg					2,3,4,7,8-PeCDF 57117-31-4 ng/kg					2,3,7,8-TCDD 1746-01-6 ng/kg					2,3,7,8-TCDF 51207-31-9 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0067-C2CS	9.37	J	9.37	J	ND or <QL	22.3	J	22.3	J	ND or <QL	17.5	J	17.5	J	ND or <QL	1780		3360	F	*1.888	153		215	F	*1.405
08A-0067-C2DS	< 0.0858	U	< 0.0858	U	ND or <QL	< 0.164	U	< 0.164	U	ND or <QL	< 0.0846	U	< 0.0846	U	ND or <QL	7.62		14.4	F	*1.890	< 1.23	U	< 1.23	U	ND or <QL
08A-0067-C2ES	< 0.0943	U	< 0.157	U	Split-Replaced	< 0.113	U	< 0.360	U	Split-Replaced	< 0.0930	U	< 0.206	U	Split-Replaced	0.971	J	0.351	EZ	Split-Replaced	< 0.172	U	< 0.164	U	Split-Replaced
08A-0067-C2FS	< 0.0584	U	< 0.0584	U	ND or <QL	< 0.130	U	< 0.130	U	ND or <QL	< 0.0566	U	< 0.0566	U	ND or <QL	0.936	J	0.936	J	ND or <QL	< 0.136	U	< 0.136	U	ND or <QL
08A-0068-C1AS	11.1	J	11.1	J	ND or <QL	22.6	J	22.6	J	ND or <QL	22	J	22	J	ND or <QL	304	J	574	JF	*1.888	28.3	J	39.8	JF	*1.406
08A-0068-C1BS	12.7	J	12.7	J	ND or <QL	18.4	J	18.4	J	ND or <QL	23.2	J	23.2	J	ND or <QL	783	J	1480	JF	*1.890	63.3	J	89.1	JF	*1.408
08A-0068-C1CS	5.69	J	5.69	J	ND or <QL	19.4	J	19.4	J	ND or <QL	12.2	J	12.2	J	ND or <QL	686		1290	F	*1.880	89.5		126	F	*1.408
08A-0068-C1DS	7.52	J	7.52	J	ND or <QL	6.03	J	6.03	J	ND or <QL	7.13	J	7.13	J	ND or <QL	292		551	F	*1.887	20.6		29	F	*1.408
08A-0068-C1ES	0.772	J	0.772	J	ND or <QL	0.478	J	0.478	J	ND or <QL	0.724	J	0.724	J	ND or <QL	7.73	J	14.6	JF	*1.889	2.04		2.87	F	*1.407
08A-0068-C1ET	1.33	J	1.33	J	ND or <QL	0.745	J	0.745	J	ND or <QL	1.22	J	1.22	J	ND or <QL	10.6	J	20	JF	*1.887	3.33		4.69	F	*1.408
08A-0069-C1AS	8.22	J	8.22	J	ND or <QL	14.1	J	14.1	J	ND or <QL	15.2	J	15.2	J	ND or <QL	928	J	1750	JF	*1.886	24.9	J	35.1	JF	*1.410
08A-0069-C1BS	26.6	J	26.6	J	ND or <QL	54.3	J	60.3	JF	*1.110	49.8	J	68.2	JF	*1.369	6280	J	11900	JF	*1.895	65.4	J	92.1	JF	*1.408
08A-0069-C1CS	27	J	27	J	ND or <QL	55.6	J	61.8	JF	*1.112	49.8	J	68.2	JF	*1.369	16.5	J	31.1	JF	*1.885	49.7	J	70	JF	*1.408
08A-0069-C1DS	32.6		35.8	F	*1.098	15.1	J	15.1	J	ND or <QL	25.1	J	25.1	J	ND or <QL	4.34		8.19	F	*1.887	25	J	35.2	JF	*1.408
08A-0069-C1ES	1.9	J	1.9	J	ND or <QL	0.938	J	0.938	J	ND or <QL	1.4	J	1.4	J	ND or <QL	< 0.933	U	< 0.933	U	ND or <QL	2.16		3.04	F	*1.407
08A-0070-C3CS	1.08	J	1.08	J	ND or <QL	2.31	J	2.31	J	ND or <QL	2.06	J	2.06	J	ND or <QL	33.9		64	F	*1.888	4	J	5.63	JF	*1.408
08A-0070-C3DS	1.19	J	1.19	J	ND or <QL	2.17	J	2.17	J	ND or <QL	1.94	J	1.94	J	ND or <QL	43.3		81.7	F	*1.887	4.35	J	6.12	JF	*1.407
08A-0070-C3ES	5.84	J	5.84	J	ND or <QL	12	J	12	J	ND or <QL	7.72	J	7.72	J	ND or <QL	280		528	F	*1.886	18.5	J	26	JF	*1.405
08A-0071-C1AS	0.949	J	0.949	J	ND or <QL	1.81	J	1.81	J	ND or <QL	1.27	J	1.27	J	ND or <QL	10.1		19.1	F	*1.891	1.72	J	1.72	J	ND or <QL
08A-0071-C1BS	0.501	J	0.501	J	ND or <QL	0.948	J	0.948	J	ND or <QL	0.839	J	0.839	J	ND or <QL	16.2		30.6	F	*1.889	1.6	J	1.6	J	ND or <QL
08A-0071-C1CS	1.65	J	1.65	J	ND or <QL	< 0.119	U	< 0.119	U	ND or <QL	1.57	J	1.57	J	ND or <QL	0.987	J	0.987	J	ND or <QL	3.05		4.29	F	*1.407
08A-0072-C6AS	0.847	J	0.847	J	ND or <QL	3.37	J	3.37	J	ND or <QL	2.02	J	2.02	J	ND or <QL	31.5		59.4	F	*1.886	4.18		5.89	F	*1.409
08A-0073-C4AS	14.2	J	14.2	J	ND or <QL	21.8	J	21.8	J	ND or <QL	13.2	J	13.2	J	ND or <QL	119	J	225	JF	*1.891	17.4	J	24.5	JF	*1.408
08A-0073-C4BS	22.9	J	22.9	J	ND or <QL	46.7	J	51.9	JF	*1.111	43.5	J	43.5	J	ND or <QL	649	J	1220	JF	*1.880	45.3	J	63.8	JF	*1.408
08A-0073-C4CS	6.21	J	6.21	J	ND or <QL	9.8	J	9.8	J	ND or <QL	9.96	J	9.96	J	ND or <QL	59.4		112	F	*1.886	9.98		14.1	F	*1.413
08A-0074-C2AS	4.59	J	4.59	J	ND or <QL	11.2	J	11.2	J	ND or <QL	8.06	J	8.06	J	ND or <QL	87	J	164	JF	*1.885	13	J	18.3	JF	*1.408
08A-0074-C2BS	4.07	J	4.07	J	ND or <QL	8.85	J	8.85	J	ND or <QL	6.32	J	6.32	J	ND or <QL	63.8	J	120	JF	*1.881	8.46	J	11.9	JF	*1.407
08A-0074-C2CS	4.5	J	4.5	J	ND or <QL	8.3	J	8.3	J	ND or <QL	7.65	J	7.65	J	ND or <QL	94.2	J	178	JF	*1.890	10.6	J	14.9	JF	*1.406
08A-0074-C2DS	1.52	J	1.52	J	ND or <QL	3.17	J	3.17	J	ND or <QL	2.51	J	2.51	J	ND or <QL	22.7		42.8	F	*1.885	3.87		5.45	F	*1.408
08A-0074-C2ES	8.04	J	8.04	J	ND or <QL	21.7	J	21.7	J	ND or <QL	19.4	J	19.4	J	ND or <QL	143		270	F	*1.888	20.6		29	F	*1.408
08A-0074-C2FS	2.67	J	2.67	J	ND or <QL	5.17	J	5.17	J	ND or <QL	11.6	J	11.6	J	ND or <QL	50.9	J	96	JF	*1.886	9.23	J	13	JF	*1.408
08A-0074-C2GS	15	J	15	J	ND or <QL	33.9		37.7	F	*1.112	38.2		52.3	F	*1.369	1590		3000	F	*1.887	47.1		66.3	F	*1.408
08A-0075-C1AS	0.732	J	0.732	J	ND or <QL	2.37	J	2.37	J	ND or <QL	1.89	J	1.89	J	ND or <QL	18		34	F	*1.889	2.71	J	3.82	JF	*1.410
08A-0075-C1BS	1.16	J	1.16	J	ND or <QL	2.52	J	2.52	J	ND or <QL	1.99	J	1.99	J	ND or <QL	35.7		67.4	F	*1.888	2.85		4.01	F	*1.407
08A-0076-C5AS	7.04	J	7.04	J	ND or <QL	8.6	J	8.6	J	ND or <QL	15.3	J	15.3	J	ND or <QL	157	J	296	JF	*1.885	48.4	J	68.1	JF	*1.407
08A-0076-C5BS	0.372	J	0.372	J	ND or <QL	< 0.600	U	< 0.600	U	ND or <QL	0.701	J	0.701	J	ND or <QL	6.09		11.5	F	*1.888	1.51	J	1.51	J	ND or <QL
08A-0076-C5CS	< 0.105	U	< 0.105	U	ND or <QL	< 0.270	U	< 0.270	U	ND or <QL	0.198	J	0.198	J	ND or <QL	2.71		5.11	F	*1.886	< 0.644	U	< 0.644	U	ND or <QL
08A-0077-C2AS	9.79	J	9.79	J	ND or <QL	13.5	J	13.5	J	ND or <QL	17.2	J	17.2	J	ND or <QL	3									

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,7,8-PeCDF 57117-41-6 ng/kg					2,3,4,6,7,8-HxCDF 60851-34-5 ng/kg					2,3,4,7,8-PeCDF 57117-31-4 ng/kg					2,3,7,8-TCDD 1746-01-6 ng/kg					2,3,7,8-TCDF 51207-31-9 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0079-C4AS	3.46	J	3.46	J	ND or <QL	5.99	J	5.99	J	ND or <QL	4.84	J	4.84	J	ND or <QL	3.39		6.4	F	*1.888	5.03		7.08	F	*1.408
08A-0079-C4BS	1.57	J	1.57	J	ND or <QL	1.99	J	1.99	J	ND or <QL	2.59	J	2.59	J	ND or <QL	1.31	J	1.31	J	ND or <QL	5.19		7.31	F	*1.408
08A-0079-C4CS	2.59	J	2.59	J	ND or <QL	2.04	J	2.04	J	ND or <QL	4.25	J	4.25	J	ND or <QL	18		34	F	*1.889	7.35		10.3	F	*1.401
08A-0079-C4DS	1.38	J	1.38	J	ND or <QL	5.44	J	5.44	J	ND or <QL	3.21	J	3.21	J	ND or <QL	6.85		12.9	F	*1.883	4.67		6.58	F	*1.409
08A-0079-C4ES	1.16	J	1.16	J	ND or <QL	3.28	J	3.28	J	ND or <QL	4.81	J	4.81	J	ND or <QL	33.4		63	F	*1.886	5.53		7.79	F	*1.409
08A-0080-C1AS	1.24	J	1.24	J	ND or <QL	4.37	J	4.37	J	ND or <QL	2.86	J	2.86	J	ND or <QL	12.1		22.8	F	*1.884	3.86		5.43	F	*1.407
08A-0080-C1BS	1.15	J	1.15	J	ND or <QL	2.42	J	2.42	J	ND or <QL	1.99	J	1.99	J	ND or <QL	12		22.6	F	*1.883	3.44	J	4.84	JF	*1.407
08A-0080-C1CS	0.775	J	0.775	J	ND or <QL	2.33	J	2.33	J	ND or <QL	1.97	J	1.97	J	ND or <QL	10.8		20.4	F	*1.889	4.06		5.72	F	*1.409
08A-0080-C1DS	3.37	J	3.37	J	ND or <QL	8.14	J	8.14	J	ND or <QL	9.19	J	9.19	J	ND or <QL	90.9		172	F	*1.892	15.9	J	22.4	JF	*1.409
08A-0080-C1ES	1.53	J	1.53	J	ND or <QL	3.88	J	3.88	J	ND or <QL	2.7	J	2.7	J	ND or <QL	102	J	192	JF	*1.882	4.72		6.65	F	*1.409
08A-0081-C2AS	1.17	J	1.17	J	ND or <QL	3.26	J	3.26	J	ND or <QL	1.8	J	1.8	J	ND or <QL	0.817	J	0.817	J	ND or <QL	4.31		6.07	F	*1.408
08A-0081-C2BS	0.218	J	0.218	J	ND or <QL	< 0.548	U	< 0.548	U	ND or <QL	0.324	J	0.324	J	ND or <QL	0.218	J	0.218	J	ND or <QL	1.4	J	1.4	J	ND or <QL
08A-0081-C2CS	0.647	J	0.647	J	ND or <QL	1.81	J	1.81	J	ND or <QL	1.01	J	1.01	J	ND or <QL	0.563	J	0.563	J	ND or <QL	3.04		4.28	F	*1.408
08A-0081-C2DS	0.594	J	0.594	J	ND or <QL	0.824	J	0.824	J	ND or <QL	1.08	J	1.08	J	ND or <QL	0.639	J	0.639	J	ND or <QL	2.43	J	3.42	JF	*1.407
08A-0082-C2AS	1.29	J	1.29	J	ND or <QL	4.51	J	4.51	J	ND or <QL	2.12	J	2.12	J	ND or <QL	3.62		6.83	F	*1.887	3.45	J	4.86	JF	*1.409
08A-0082-C2BS	2.5	J	2.5	J	ND or <QL	7	J	7	J	ND or <QL	3.91	J	3.91	J	ND or <QL	11.4		21.5	F	*1.886	5.84	J	8.22	JF	*1.408
08A-0082-C2CS	3.21	J	3.21	J	ND or <QL	10.6	J	10.6	J	ND or <QL	6.29	J	6.29	J	ND or <QL	5.84		11	F	*1.884	7.92		11.2	F	*1.414
08A-0082-C2DS	1.48	J	1.48	J	ND or <QL	4.66	J	4.66	J	ND or <QL	2.45	J	2.45	J	ND or <QL	1.75	J	3.3	JF	*1.886	3.35		4.72	F	*1.409
08A-0082-C2ES	5.02	J	5.02	J	ND or <QL	12.7	J	12.7	J	ND or <QL	9.4	J	9.4	J	ND or <QL	7.4		14	F	*1.892	12.4		17.5	F	*1.411
08A-0082-C2FS	5.17	J	5.17	J	ND or <QL	13.2	J	13.2	J	ND or <QL	10	J	10	J	ND or <QL	16.5	J	31.1	JF	*1.885	10.1	J	14.2	JF	*1.406
08A-0082-C2FT	5.2	J	5.2	J	ND or <QL	14.1	J	14.1	J	ND or <QL	9.58	J	9.58	J	ND or <QL	11.6	J	21.9	JF	*1.888	10.6	J	14.9	JF	*1.406
08A-0082-C2GS	5.21	J	5.21	J	ND or <QL	14.5	J	14.5	J	ND or <QL	9.46	J	9.46	J	ND or <QL	21.4		40.4	F	*1.888	12.3		17.3	F	*1.407
08A-0082-C2HS	8.44	J	8.44	J	ND or <QL	25.5		28.3	F	*1.110	16.5	J	16.5	J	ND or <QL	115		217	F	*1.887	20.8		29.3	F	*1.409
08A-0082-C2IS	6.95	J	6.95	J	ND or <QL	25.8		28.7	F	*1.112	13	J	13	J	ND or <QL	30.7		57.9	F	*1.886	20.5		28.9	F	*1.410
08A-0082-C2JS	6.42	J	6.42	J	ND or <QL	21		23.3	F	*1.110	12	J	12	J	ND or <QL	32.8		61.9	F	*1.887	18.5		26	F	*1.405
08A-0082-C2KS	3.55	J	3.55	J	ND or <QL	8.6	J	8.6	J	ND or <QL	5.71	J	5.71	J	ND or <QL	6.91		13	F	*1.881	6.66		9.38	F	*1.408
08A-0083-C2AS	0.646	J	0.646	J	ND or <QL	1.71	J	1.71	J	ND or <QL	1.07	J	1.07	J	ND or <QL	0.362	J	0.362	J	ND or <QL	0.888	J	0.888	J	ND or <QL
08A-0083-C2BS	0.626	J	0.626	J	ND or <QL	1.53	J	1.53	J	ND or <QL	0.93	J	0.93	J	ND or <QL	0.465	J	0.465	J	ND or <QL	< 1.64	U	< 1.64	U	ND or <QL
08A-0083-C2CS	0.653	J	0.653	J	ND or <QL	1.17	J	1.17	J	ND or <QL	0.924	J	0.924	J	ND or <QL	0.292	J	0.292	J	ND or <QL	1.19	J	1.19	J	ND or <QL
08A-0083-C2DS	1.06	J	1.06	J	ND or <QL	3.71	J	3.71	J	ND or <QL	2.04	J	2.04	J	ND or <QL	0.615	J	0.615	J	ND or <QL	1.38	J	1.38	J	ND or <QL
08A-0083-C2ES	0.883	J	0.883	J	ND or <QL	2.21	J	2.21	J	ND or <QL	1.55	J	1.55	J	ND or <QL	0.397	J	0.397	J	ND or <QL	1.12	J	1.12	J	ND or <QL
08A-0084-C1AS	0.646	J	0.646	J	ND or <QL	1.82	J	1.82	J	ND or <QL	0.917	J	0.917	J	ND or <QL	0.715	J	0.715	J	ND or <QL	1.8		2.53	F	*1.406
08A-0084-C1BS	0.296	J	0.296	J	ND or <QL	0.887	J	0.887	J	ND or <QL	0.462	J	0.462	J	ND or <QL	< 0.178	U	< 0.178	U	ND or <QL	< 0.961	UJ	< 0.961	UJ	ND or <QL
08A-0084-C1BT	< 0.215	U	< 0.215	U	ND or <QL	1.14	J	1.14	J	ND or <QL	< 0.216	U	< 0.216	U	ND or <QL	< 0.358	U	< 0.358	U	ND or <QL	2.08	J	2.93	JF	*1.409
08A-0084-C1CS	8.15	J	8.15	J	ND or <QL	24.7	J	24.7	J	ND or <QL	14.8	J	14.8	J	ND or <QL	23.5	J	44.3	JF	*1.885	24.4	J	34.4	JF	*1.410
08A-0084-C1DS	6.35	J	6.35	J	ND or <QL	19.2	J	19.2	J	ND or <QL	13	J	13	J	ND or <QL	9.97		18.8	F	*1.886	20.6		29	F	*1.408
08A-0084-C1ES	7.25	J	7.84	BDJ	Split-Replaced	23.8	J	14.7	BDJ	Split-Replaced	14.1	J	15	BDJ	Split-Replaced	15.5		21.4	BD	Split-Replaced	19.7	J	20		Split-Replaced
08A-0084-C1FS	9.68	J	9.85		Split-Replaced	27.5		21.8	B</																

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,7,8-PeCDF 57117-41-6 ng/kg					2,3,4,6,7,8-HxCDF 60851-34-5 ng/kg					2,3,4,7,8-PeCDF 57117-31-4 ng/kg					2,3,7,8-TCDD 1746-01-6 ng/kg					2,3,7,8-TCDF 51207-31-9 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0086-C3CS	< 1.14	U	< 1.14	U	ND or <QL	0.06	J	0.06	J	ND or <QL	0.153	J	0.153	J	ND or <QL	< 0.0893	U	< 0.0893	U	ND or <QL	< 1.03	U	< 1.03	U	ND or <QL
08A-0086-C3DS	< 0.0740	U	< 0.0740	U	ND or <QL	< 0.0804	U	< 0.0804	U	ND or <QL	< 0.0694	U	< 0.0694	U	ND or <QL	< 0.0793	U	< 0.0793	U	ND or <QL	< 0.538	U	< 0.538	U	ND or <QL
08A-0086-C3ES	< 0.0459	U	< 0.0459	U	ND or <QL	< 0.0394	U	< 0.0394	U	ND or <QL	< 0.0418	U	< 0.0418	U	ND or <QL	< 0.322	U	< 0.322	U	ND or <QL	< 0.346	U	< 0.346	U	ND or <QL
08A-0087-C3AS	0.19	J	0.19	J	ND or <QL	0.53	J	0.53	J	ND or <QL	0.334	J	0.334	J	ND or <QL	< 0.0579	U	< 0.0579	U	ND or <QL	< 0.666	U	< 0.666	U	ND or <QL
08A-0087-C3BS	< 0.0428	U	< 0.0428	U	ND or <QL	< 0.0440	U	< 0.0440	U	ND or <QL	< 0.0404	U	< 0.0404	U	ND or <QL	< 0.394	U	< 0.394	U	ND or <QL	< 0.675	U	< 0.675	U	ND or <QL
08A-0087-C3CS	< 0.0966	U	< 0.0966	U	ND or <QL	< 0.0847	U	< 0.0847	U	ND or <QL	< 0.0843	U	< 0.0843	U	ND or <QL	< 0.567	U	< 0.567	U	ND or <QL	< 0.0889	U	< 0.0889	U	ND or <QL
08A-0087-C3DS	< 0.0282	U	< 0.0282	U	ND or <QL	< 0.0337	U	< 0.0337	U	ND or <QL	< 0.0256	U	< 0.0256	U	ND or <QL	< 0.522	U	< 0.522	U	ND or <QL	< 0.0432	U	< 0.0432	U	ND or <QL
08A-0088-C1AS	0.118	J	0.118	J	ND or <QL	0.335	J	0.335	J	ND or <QL	0.127	J	0.127	J	ND or <QL	< 0.0626	U	< 0.0626	U	ND or <QL	< 0.473	UJ	< 0.473	UJ	ND or <QL
08A-0088-C1BS	< 0.0368	U	< 0.0368	U	ND or <QL	< 0.0359	U	< 0.0359	U	ND or <QL	< 0.0366	U	< 0.0366	U	ND or <QL	< 0.0545	U	< 0.0545	U	ND or <QL	< 0.0706	U	< 0.0706	U	ND or <QL
08A-0088-C1CS	< 0.0686	U	< 0.0686	U	ND or <QL	< 0.0789	U	< 0.0789	U	ND or <QL	< 0.0689	U	< 0.0689	U	ND or <QL	< 0.0731	U	< 0.0731	U	ND or <QL	< 0.103	U	< 0.103	U	ND or <QL
08A-0089-C2AS	0.988	J	0.988	J	ND or <QL	2.04	J	2.04	J	ND or <QL	1.45	J	1.45	J	ND or <QL	< 0.434	UJ	< 0.434	UJ	ND or <QL	1.85	J	2.6	JF	*1.405
08A-0089-C2BS	0.482	J	0.702	J	Split-Replaced	1.08	J	< 1.13	U	Split-Replaced	0.735	J	< 1.47	U	Split-Replaced	< 0.221	UJ	0.306	EZ	Split-Replaced	< 1.35	UJ	1.53	J	Split-Replaced
08A-0089-C2CS	0.587	J	1.32	EZ	Split-Replaced	1.38	J	< 1.81	U	Split-Replaced	1.07	J	1.52	BJ	Split-Replaced	< 0.142	U	0.764	EZ	Split-Replaced	< 1.33	UJ	2.94		Split-Replaced
08A-0089-C2DS	0.927	J	0.927	J	ND or <QL	1.19	J	1.19	J	ND or <QL	1.25	J	1.25	J	ND or <QL	< 0.354	UJ	< 0.354	UJ	ND or <QL	2.58		3.63	F	*1.407
08A-0089-C2ES	0.378	J	0.378	J	ND or <QL	1.34	J	1.34	J	ND or <QL	0.672	J	0.672	J	ND or <QL	< 0.201	UJ	< 0.201	UJ	ND or <QL	1.29	J	1.29	J	ND or <QL
08A-0090-C5AS	0.764	J	0.764	J	ND or <QL	3.3	J	3.3	J	ND or <QL	1.57	J	1.57	J	ND or <QL	0.303	J	0.303	J	ND or <QL	1.53	J	1.53	J	ND or <QL
08A-0090-C5BS	0.238	J	0.238	J	ND or <QL	< 0.565	U	< 0.565	U	ND or <QL	0.372	J	0.372	J	ND or <QL	< 0.0764	U	< 0.0764	U	ND or <QL	< 0.823	U	< 0.823	U	ND or <QL
08A-0092-C1AS	0.383	J	0.383	J	ND or <QL	< 0.208	UJ	< 0.208	UJ	ND or <QL	0.387	J	0.387	J	ND or <QL	< 0.225	U	< 0.225	U	ND or <QL	< 0.779	U	< 0.779	U	ND or <QL
08A-0096-C3AS	0.902	J	0.902	J	ND or <QL	2.72	J	2.72	J	ND or <QL	1.28	J	1.28	J	ND or <QL	< 0.417	UJ	< 0.417	UJ	ND or <QL	1.68	J	2.37	JF	*1.411
08A-0096-C3BS	2.11	J	2.11	J	ND or <QL	7.13	J	7.13	J	ND or <QL	4.03	J	4.03	J	ND or <QL	< 1.56	U	< 1.56	U	ND or <QL	6.71		9.45	F	*1.408
08A-0098-C1AS	< 2.81	UJ	< 2.81	UJ	ND or <QL	< 0.512	U	< 0.512	U	ND or <QL	4.86	J	4.86	J	ND or <QL	< 1.05	UJ	< 1.05	UJ	ND or <QL	9.68	J	13.6	JF	*1.405
08A-0098-C1BS	< 2.40	U	< 2.40	U	ND or <QL	4.3	J	4.3	J	ND or <QL	4.8	J	4.8	J	ND or <QL	4.21		7.94	F	*1.886	42.8		60.3	F	*1.409
08A-0098-C1CS	11	J	11	J	ND or <QL	60.5	J	67.2	JF	*1.111	19.4	J	19.4	J	ND or <QL	< 1.35	UJ	< 1.35	UJ	ND or <QL	14.2	J	20	JF	*1.408
08A-0098-C1DS	< 5.29	UJ	< 5.29	UJ	ND or <QL	4.47	J	4.47	J	ND or <QL	3.32	J	3.32	J	ND or <QL	< 0.119	UJ	< 0.119	UJ	ND or <QL	5.62	J	7.91	JF	*1.407
08A-0098-C1ES	< 5.50	UJ	6.42	J	Split-Replaced	4.37	J	4.72	BJ	Split-Replaced	5.03	J	5.06	BJ	Split-Replaced	< 0.929	UJ	0.705	J	Split-Replaced	8.53	J	7.14		Split-Replaced
08A-0098-C1FS	25.6	J	13.5		Split-Replaced	7.6	J	5.58	BJ	Split-Replaced	15.8	J	9.42	B	Split-Replaced	< 0.795	UJ	0.883	EZ	Split-Replaced	140	J	33.9		Split-Replaced
08A-0098-C1GS	18.8	J	18.8	J	ND or <QL	7.31	J	7.31	J	ND or <QL	11.5	J	11.5	J	ND or <QL	< 0.413	UJ	< 0.413	UJ	ND or <QL	33.2	J	46.7	JF	*1.407
08A-0099-C1AS	< 0.548	UJ	< 0.548	UJ	ND or <QL	1.53	J	1.53	J	ND or <QL	< 0.910	U	< 0.910	U	ND or <QL	< 0.467	U	< 0.467	U	ND or <QL	1.83	J	2.58	JF	*1.410
08A-0099-C1BS	< 2.27	U	< 2.27	U	ND or <QL	6.32	J	6.32	J	ND or <QL	3.69	J	3.69	J	ND or <QL	< 1.54	UJ	< 1.54	UJ	ND or <QL	6.4	J	9.01	JF	*1.408
08A-0099-C1CS	< 7.23	UJ	< 7.23	UJ	ND or <QL	19.7	J	19.7	J	ND or <QL	10.9	J	10.9	J	ND or <QL	4.6	J	8.68	JF	*1.887	19	J	26.8	JF	*1.411
08A-0099-C1DS	< 7.64	UJ	< 7.64	UJ	ND or <QL	13	J	13	J	ND or <QL	12.4	J	12.4	J	ND or <QL	< 3.40	UJ	< 3.40	UJ	ND or <QL	22.2	J	31.3	JF	*1.410
08A-0099-C1ES	< 6.91	UJ	< 6.91	UJ	ND or <QL	13.7	J	13.7	J	ND or <QL	13.7	J	13.7	J	ND or <QL	12.3		23.2	F	*1.886	155	J	218	JF	*1.406
08A-0099-C1FS	< 7.11	U	< 7.11	U	ND or <QL	3.07	J	3.07	J	ND or <QL	5.27	J	5.27	J	ND or <QL	< 0.147	U	< 0.147	U	ND or <QL	15.5	J	21.8	JF	*1.406
08A-0100-C1AS	< 0.852	U	< 0.852	U	ND or <QL	0.564	J	0.564	J	ND or <QL	0.887	J	0.887	J	ND or <QL	< 0.167	U	< 0.167	U	ND or <QL	2.12		2.98	F	*1.406
08A-0100-C1BS	< 5.06																								

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,7,8-PeCDF 57117-41-6 ng/kg					2,3,4,6,7,8-HxCDF 60851-34-5 ng/kg					2,3,4,7,8-PeCDF 57117-31-4 ng/kg					2,3,7,8-TCDD 1746-01-6 ng/kg					2,3,7,8-TCDF 51207-31-9 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0104-C1DS	< 1.83	UJ	< 1.83	UJ	ND or <QL	< 1.26	UJ	< 1.26	UJ	ND or <QL	< 1.23	UJ	< 1.23	UJ	ND or <QL	< 0.526	UJ	< 0.526	UJ	ND or <QL	6.95	J	9.79	JF	*1.409
08A-0104-C1ES	< 2.67	UJ	< 2.67	UJ	ND or <QL	2.04	J	2.04	J	ND or <QL	< 2.57	UJ	< 2.57	UJ	ND or <QL	< 2.19	UJ	< 2.19	UJ	ND or <QL	4.91	J	6.91	JF	*1.407
08A-0104-C1FS	< 6.18	U	< 6.18	U	ND or <QL	2.76	J	2.76	J	ND or <QL	3.47	J	3.47	J	ND or <QL	< 0.142	U	< 0.142	U	ND or <QL	4.58	J	6.45	JF	*1.408
08A-0104-C1FT	< 4.33	UJ	< 4.33	UJ	ND or <QL	< 0.878	UJ	< 0.878	UJ	ND or <QL	< 2.01	UJ	< 2.01	UJ	ND or <QL	< 0.0868	UJ	< 0.0868	UJ	ND or <QL	2.59	J	2.59	J	ND or <QL
08A-0104-C1GS	< 6.28	UJ	< 6.28	UJ	ND or <QL	1.42	J	1.42	J	ND or <QL	2.69	J	2.69	J	ND or <QL	< 0.102	UJ	< 0.102	UJ	ND or <QL	6.83	J	9.62	JF	*1.408
08A-0106-C1AS	0.3	J	0.3	J	ND or <QL	0.541	J	0.541	J	ND or <QL	0.407	J	0.407	J	ND or <QL	< 0.0319	U	< 0.0319	U	ND or <QL	0.363	J	0.363	J	ND or <QL
08A-0107-C2AS	0.468	J	0.468	J	ND or <QL	0.748	J	0.748	J	ND or <QL	0.591	J	0.591	J	ND or <QL	4.41		8.32	F	*1.887	< 1.29	U	< 1.29	U	ND or <QL
08A-0108-C1AS	1.06	J	1.06	J	ND or <QL	2.4	J	2.4	J	ND or <QL	1.37	J	1.37	J	ND or <QL	< 1.93	UJ	< 1.93	UJ	ND or <QL	< 1.50	U	< 1.50	U	ND or <QL
08A-0108-C1BS	1.53	J	1.53	J	ND or <QL	2.6	J	2.6	J	ND or <QL	2.13	J	2.13	J	ND or <QL	< 1.59	UJ	< 1.59	UJ	ND or <QL	< 1.76	U	< 1.76	U	ND or <QL
08A-0109-C3AS	< 0.0717	UJ	< 0.0717	UJ	ND or <QL	< 0.109	UJ	< 0.109	UJ	ND or <QL	< 0.0738	UJ	< 0.0738	UJ	ND or <QL	0.467	J	0.467	J	ND or <QL	< 0.118	UJ	< 0.118	UJ	ND or <QL
08A-0109-C3BS	< 0.0541	U	< 0.0541	U	ND or <QL	< 0.0814	U	< 0.0814	U	ND or <QL	< 0.0580	U	< 0.0580	U	ND or <QL	< 0.0563	U	< 0.0563	U	ND or <QL	< 0.0870	U	< 0.0870	U	ND or <QL
08A-0109-C3CS	< 0.0428	U	< 0.0428	U	ND or <QL	< 0.136	U	< 0.136	U	ND or <QL	< 0.0405	U	< 0.0405	U	ND or <QL	< 0.0244	U	< 0.0244	U	ND or <QL	< 0.0369	U	< 0.0369	U	ND or <QL
08A-0109-C3DS	< 0.0285	U	< 0.0285	U	ND or <QL	< 0.0689	U	< 0.0689	U	ND or <QL	< 0.0285	U	< 0.0285	U	ND or <QL	< 0.0282	U	< 0.0282	U	ND or <QL	< 0.0560	U	< 0.0560	U	ND or <QL
08A-0109-C3ES	< 0.0540	U	< 0.0540	U	ND or <QL	< 0.0610	U	< 0.0610	U	ND or <QL	< 0.0563	U	< 0.0563	U	ND or <QL	< 0.109	U	< 0.109	U	ND or <QL	< 0.101	U	< 0.101	U	ND or <QL
08A-0109-C3ET	< 0.0736	U	< 0.0736	U	ND or <QL	< 0.0820	U	< 0.0820	U	ND or <QL	< 0.0752	U	< 0.0752	U	ND or <QL	< 0.124	U	< 0.124	U	ND or <QL	< 0.153	U	< 0.153	U	ND or <QL
08A-0110-C1AS	2.17	J	2.17	J	ND or <QL	7.3	J	7.3	J	ND or <QL	4.6	J	4.6	J	ND or <QL	76.4		144	F	*1.885	< 8.37	U	< 8.37	U	ND or <QL
08A-0110-C1BS	1.6	J	1.6	J	ND or <QL	3.18	J	3.18	J	ND or <QL	2.42	J	2.42	J	ND or <QL	11.9		22.5	F	*1.891	< 5.70	U	< 5.70	U	ND or <QL
08A-0110-C1CS	4.23	J	4.23	J	ND or <QL	12.8	J	12.8	J	ND or <QL	8.36	J	8.36	J	ND or <QL	23.2		43.8	F	*1.888	12.5	J	17.6	JF	*1.408
08A-0110-C1DS	< 0.187	UJ	< 0.187	UJ	ND or <QL	< 0.394	UJ	< 0.394	UJ	ND or <QL	< 0.204	UJ	< 0.204	UJ	ND or <QL	15.6	J	29.4	JF	*1.885	< 3.33	UJ	< 3.33	UJ	ND or <QL
08A-0110-C1ES	< 0.152	U	< 0.152	U	ND or <QL	< 0.299	U	< 0.299	U	ND or <QL	< 0.159	U	< 0.159	U	ND or <QL	< 0.301	U	< 0.301	U	ND or <QL	< 0.326	U	< 0.326	U	ND or <QL
08A-0110-C1FS	0.425	J	0.425	J	ND or <QL	< 0.161	U	< 0.161	U	ND or <QL	< 0.122	U	< 0.122	U	ND or <QL	< 0.142	U	< 0.142	U	ND or <QL	< 1.11	U	< 1.11	U	ND or <QL
08A-0110-C1GS	< 0.0719	U	< 0.0719	U	ND or <QL	< 0.142	U	< 0.142	U	ND or <QL	< 0.0753	U	< 0.0753	U	ND or <QL	< 0.138	U	< 0.138	U	ND or <QL	< 0.205	U	< 0.205	U	ND or <QL
08A-0111-C1AS	0.136	J	0.136	J	ND or <QL	0.157	J	0.157	J	ND or <QL	0.187	J	0.187	J	ND or <QL	< 0.0355	U	< 0.0355	U	ND or <QL	< 0.362	U	< 0.362	U	ND or <QL
08A-0111-C1BS	0.307	J	0.307	J	ND or <QL	0.457	J	0.457	J	ND or <QL	0.432	J	0.432	J	ND or <QL	< 0.293	UJ	< 0.293	UJ	ND or <QL	< 0.652	U	< 0.652	U	ND or <QL
08A-0111-C1CS	3.41	J	3.41	J	ND or <QL	8.19	J	8.19	J	ND or <QL	5.3	J	5.3	J	ND or <QL	< 0.774	UJ	< 0.774	UJ	ND or <QL	5.84		8.22	F	*1.408
08A-0111-C1DS	0.654	J	0.654	J	ND or <QL	0.747	J	0.747	J	ND or <QL	1.17	J	1.17	J	ND or <QL	< 0.177	UJ	< 0.177	UJ	ND or <QL	1.35	J	1.35	J	ND or <QL
08A-0112-C2AS	0.468	J	0.468	J	ND or <QL	0.93	J	0.93	J	ND or <QL	0.671	J	0.671	J	ND or <QL	< 0.117	U	< 0.117	U	ND or <QL	< 1.39	U	< 1.39	U	ND or <QL
08A-0112-C2BS	0.725	J	0.725	J	ND or <QL	2.13	J	2.13	J	ND or <QL	1.56	J	1.56	J	ND or <QL	< 0.212	UJ	< 0.212	UJ	ND or <QL	1.95		2.75	F	*1.410
08A-0112-C2CS	0.854	J	0.854	J	ND or <QL	1.44	J	1.44	J	ND or <QL	1.22	J	1.22	J	ND or <QL	< 0.270	UJ	< 0.270	UJ	ND or <QL	1.93		2.72	F	*1.409
08A-0112-C2DS	0.684	J	0.684	J	ND or <QL	0.826	J	0.826	J	ND or <QL	0.815	J	0.815	J	ND or <QL	< 0.107	UJ	< 0.107	UJ	ND or <QL	2.88	J	4.06	JF	*1.410
08A-0113-C1AS	0.43	J	0.43	J	ND or <QL	1.27	J	1.27	J	ND or <QL	0.605	J	0.605	J	ND or <QL	< 0.0859	U	< 0.0859	U	ND or <QL	< 0.536	U	< 0.536	U	ND or <QL
08A-0113-C1BS	1.08	J	1.08	J	ND or <QL	2.75	J	2.75	J	ND or <QL	2.1	J	2.1	J	ND or <QL	< 0.411	UJ	< 0.411	UJ	ND or <QL	1.93	J	1.93	J	ND or <QL
08A-0113-C1CS	0.899	J	0.899	J	ND or <QL	2.82	J	2.82	J	ND or <QL	1.4	J	1.4	J	ND or <QL	< 0.122	UJ	< 0.122	UJ	ND or <QL	2.18	J	2.18	J	ND or <QL
08A-0114-C2AS	7.22	J	7.22	J	ND or <QL	28.7		31.9	F	*1.111															

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	1,2,3,7,8-PeCDF 57117-41-6 ng/kg					2,3,4,6,7,8-HxCDF 60851-34-5 ng/kg					2,3,4,7,8-PeCDF 57117-31-4 ng/kg					2,3,7,8-TCDD 1746-01-6 ng/kg					2,3,7,8-TCDF 51207-31-9 ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0118-C5AS	0.262	J	0.262	J	ND or <QL	< 1.17	U	< 1.17	U	ND or <QL	0.514	J	0.514	J	ND or <QL	< 0.0806	U	< 0.0806	U	ND or <QL	< 0.438	U	< 0.438	U	ND or <QL
08A-0118-C5CS	< 0.0959	U	< 0.0959	U	ND or <QL	< 0.0540	U	< 0.0540	U	ND or <QL	< 0.0871	U	< 0.0871	U	ND or <QL	< 0.108	U	< 0.108	U	ND or <QL	< 0.146	U	< 0.146	U	ND or <QL
08A-1070-C2AS	0.956	J	0.956	J	ND or <QL	8.83	J	8.83	J	ND or <QL	2.86	J	2.86	J	ND or <QL	24		45.3	F	*1.888	3.32		4.67	F	*1.407

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	OCDD 3268-87-9 ng/kg					OCDF 39001-02-0 ng/kg					Total HpCDD HPCDD ng/kg					Total HpCDF HPCDF ng/kg					Total HxCDD HXCDD ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0001-C1AS	2190	J	3080	JF	*1.406	3070	J	4390	JF	*1.430	516	J	516	J	None	1600	J	1600	J	None	119	J	119	J	None
08A-0001-C1BS	623	J	877	JF	*1.408	242	J	346	JF	*1.430	166	J	166	J	None	154	J	154	J	None	45.9	J	45.9	J	None
08A-0001-C1CS	2100	J	2960	JF	*1.410	1280	J	1830	JF	*1.430	487	J	487	J	None	724	J	724	J	None	130	J	130	J	None
08A-0001-C1DS	6090	J	8570	JF	*1.407	1900	J	2720	JF	*1.432	1490	J	1490	J	None	1100	J	1100	J	None	293	J	293	J	None
08A-0001-C1ES	3100	J	4360	JF	*1.406	1130	J	1610	JF	*1.425	680	J	680	J	None	732	J	732	J	None	168	J	168	J	None
08A-0001-C1FS	333	J	469	JF	*1.408	131	J	187	JF	*1.427	94.5	J	94.5	J	None	90.8	J	90.8	J	None	28.1	J	28.1	J	ND or <QL
08A-0001-C1FT	3790	J	5340	JF	*1.409	1260	J	1800	JF	*1.429	823	J	823	J	None	840	J	840	J	None	213	J	213	J	None
08A-0001-C1GS	4500		6340	F	*1.409	1330		1900	F	*1.429	1110		1110		None	919		919		None	239		239		None
08A-0001-C1HS	3760		5290	F	*1.407	967		1380	F	*1.427	841		841		None	728		728		None	227		227		None
08A-0001-C1IS	3610		5080	F	*1.407	1130		1610	F	*1.425	815		815		None	949		949		None	223		223		None
08A-0001-C1JS	3750		5280	F	*1.408	846		1210	F	*1.430	760		760		None	749		749		None	207		207		None
08A-0001-C1KS	4260		6000	F	*1.408	1390		1990	F	*1.432	961		961		None	931		931		None	227		227		None
08A-0002-C1AS	102	J	144	JF	*1.412	< 4.57	UJ	< 4.57	UJ	ND or <QL	< 15.4	UJ	< 15.4	UJ	ND or <QL	< 3.10	UJ	< 3.10	UJ	ND or <QL	2.06	J	2.06	J	ND or <QL
08A-0002-C1BS	127	J	179	JF	*1.409	< 1.71	UJ	< 1.71	UJ	ND or <QL	< 14.3	UJ	< 14.3	UJ	ND or <QL	< 1.57	UJ	< 1.57	UJ	ND or <QL	1.88	J	1.88	J	ND or <QL
08A-0002-C1CS	868		1220	F	*1.406	< 4.82	U	< 4.82	U	ND or <QL	54.9		54.9		None	< 4.73	U	< 4.73	U	ND or <QL	11.8	J	11.8	J	ND or <QL
08A-0002-C1DS	81.2		114	F	*1.404	< 0.704	U	< 0.704	U	ND or <QL	< 11.5	U	< 11.5	U	ND or <QL	< 0.346	U	< 0.346	U	ND or <QL	2.93	J	2.93	J	ND or <QL
08A-0002-C1ES	< 12.6	U	< 3.95	U	Split-Replaced	< 0.403	UJ	< 0.684	U	Split-Replaced	< 6.01	U	1.42	J	Split-Replaced	< 0.556	U	0.473	BJ	Split-Replaced	1.79	J	2.33	BJ	Split-Replaced
08A-0002-C1FS	< 12.5	U	< 4.82	U	Split-Replaced	< 0.565	U	< 1.14	U	Split-Replaced	< 6.56	U	1.86	J	Split-Replaced	< 0.376	U	< 0.144	U	Split-Replaced	1.23	J	0.553	BJ	Split-Replaced
08A-0003-C1AS	3420	J	4820	JF	*1.409	1320	J	1890	JF	*1.432	829	J	829	J	None	1130	J	1130	J	None	233	J	233	J	None
08A-0003-C1BS	2040	J	2870	JF	*1.407	331	J	473	JF	*1.429	359	J	359	J	None	339	J	339	J	None	103	J	103	J	None
08A-0003-C1CS	1030	J	1450	JF	*1.408	41.8	J	41.8	J	ND or <QL	82	J	82	J	None	26	J	26	J	ND or <QL	28.8	J	28.8	J	None
08A-0003-C1DS	270		380	F	*1.407	< 6.61	U	< 6.61	U	ND or <QL	< 32.7	U	< 32.7	U	ND or <QL	< 0.265	U	< 0.265	U	ND or <QL	8.77	J	8.77	J	ND or <QL
08A-0003-C1ES	2050		2890	F	*1.410	< 11.3	U	< 11.3	U	ND or <QL	147		147		None	9.86	J	9.86	J	ND or <QL	35.8		35.8		None
08A-0003-C1FS	303		427	F	*1.409	< 1.03	U	< 1.03	U	ND or <QL	36.4		36.4		None	< 0.895	U	< 0.895	U	ND or <QL	10.6	J	10.6	J	ND or <QL
08A-0003-C1GS	73.9		104	F	*1.407	< 0.474	U	< 0.474	U	ND or <QL	< 9.61	U	< 9.61	U	ND or <QL	< 0.244	U	< 0.244	U	ND or <QL	2.18	J	2.18	J	ND or <QL
08A-0003-C1HS	< 5.47	U	< 5.47	U	ND or <QL	< 0.422	U	< 0.422	U	ND or <QL	< 1.51	U	< 1.51	U	ND or <QL	< 0.185	U	< 0.185	U	ND or <QL	< 0.0873	U	< 0.0873	U	ND or <QL
08A-0004-C1AS	3620	J	5100	JF	*1.409	1660	J	2370	JF	*1.428	736	J	736	J	None	921	J	921	J	None	157	J	157	J	None
08A-0004-C1BS	3580	J	5040	JF	*1.408	994	J	1420	JF	*1.429	766	J	766	J	None	610	J	610	J	None	168	J	168	J	None
08A-0004-C1CS	3430	J	4830	JF	*1.408	2070	J	2960	JF	*1.430	724	J	724	J	None	1110	J	1110	J	None	173	J	173	J	None
08A-0004-C1DS	3380	J	4760	JF	*1.408	1330	J	1900	JF	*1.429	311	J	311	J	None	148	J	148	J	None	126	J	126	J	None
08A-0004-C1ES	273	J	384	JF	*1.407	162	J	231	JF	*1.426	< 77.1	UJ	< 77.1	UJ	ND or <QL	133	J	133	J	None	21.6	J	21.6	J	ND or <QL
08A-0004-C1FS	195	J	275	JF	*1.410	74.7	J	107	JF	*1.432	< 23.2	UJ	< 23.2	UJ	ND or <QL	9.9	J	9.9	J	ND or <QL	8.14	J	8.14	J	ND or <QL
08A-0004-C1FT	4450	J	6270	JF	*1.409	1520	J	2170	JF	*1.428	966	J	966	J	None	1040	J	1040	J	None	215	J	215	J	None
08A-0004-C1GS	157		221	F	*1.408	48.5		69.3	F	*1.429	< 52.8	U	< 52.8	U	ND or <QL	32.7		32.7		None	8.76	J	8.76	J	ND or <QL
08A-0004-C1HS	5690		8010	F	*1.408	735		1050	F	*1.429	1840		1840		None	583		583		None	339		339		None
08A-0004-C1IS	5110	J	7190	JF	*1.407	1070	J	1530	JF	*1.430	1320	J	1320	J	None	823	J	823	J	None	274	J	274	J	None
08A-0004-C1IT	940	J	1320	JF	*1.404	902	J	1290	JF	*1.430	242	J	242	J	None	469	J	469	J	None	61.4	J	61.4	J	None
08A-0004-C1JS	6190		8720	F	*1.409	1780		2540	F	*1.427	1430		1430		None	1190		1190		None	357		357		None
08A-0004-C1KS	689		970	F	*1.408	176		252	F	*1.432	197		197		None	92.6		92.6		None	36.6		36.6		None
08A-0004-C1LS	22300	J	31400	JF	*1.408	1580	J	2260	JF	*1.430	6310	J	6310	J	None	1020	J	1020	J	None	880	J	880	J	None
08A-0005-C1AS	2120	J	2980	JF	*1.406	432	J	617	JF	*1.428	469	J	469	J	None	325	J	325	J	None	82	J	82	J	None
08A-0005-C1BS	6130	J	8630	JF	*1.408	710	J	1010	JF	*1.423	1180	J	1180	J	None	597	J	597	J	None	214	J	214	J	None
08A-0005-C1CS	2160	J	3040	JF	*1.407	420	J	600	JF	*1.429	444	J	444	J	None	298	J	298	J	None	98.4	J	98.4	J	None
08A-0005-C1DS	6210	J	8740	JF	*1.407	1080	J	1540	JF	*1.426	1350	J	1350	J	None	790	J	790	J	None	236	J	236	J	None
08A-0005-C1ES	5630	J	7930	JF	*1.409	1240	J	1770	JF	*1.427	951	J	951	J	None	859	J	859	J	None	251	J	251	J	None
08A-0005-C1FS	729		1030	F	*1.413	650		929	F	*1.429	178		178		None	399		399		None	48.2		48.2		None
08A-0005-C1GS	4770		6720	F	*1.409	1020		1460	F	*1.431	1080		1080		None	779		779		None	267		267		None
08A-0005-C1HS	12100		17000	F	*1.405	2440		3490	F	*1.430	2860		2860		None	1800		1800		None	649		649		None
08A-0006-C1AS	1930	J	2720	JF	*1.409	478	J	683	JF	*1.429	471	J	471	J	None	356	J	356	J	None	90.9	J	90.9	J	None
08A-0006-C1AT	3870	J	5450	JF	*1.408	837	J	1200	JF	*1.434	822	J	822	J	None	591		591		None	175	J	175	J	None
08A-0006-C1BS	4750	J	5160	B	Split-Replaced	1930	J	1570	B	Split-Replaced	1050	J	1120	B	Split-Replaced	1270	J	1180	B	Split-Replaced	242	J	284	B	Split-Replaced
08A-0006-C1CS	4780	J	6730	JF	*1.408	1250	J	1790	JF	*1.432	1050	J	1050	J	None	1050	J	1050	J	None	257	J	257	J	None
08A-0006-C1DS	1480		2920	B	Split-Replaced	437		939	B	Split-Replaced	329		650	B	Split-Replaced	401		942	B	Split-Replaced	90.5		199	B	Split-Replaced

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	OCDD 3268-87-9 ng/kg					OCDF 39001-02-0 ng/kg					Total HpCDD HPCDD ng/kg					Total HpCDF HPCDF ng/kg					Total HxCDD HXCDD ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0006-C1ES	763		1070	F	*1.402	21.1	J	21.1	J	ND or <QL	180		180		None	27		27		None	99.8		99.8		None
08A-0006-C1FS	< 18.7	U	< 18.7	U	ND or <QL	< 1.13	U	< 1.13	U	ND or <QL	< 3.59	U	< 3.59	U	ND or <QL	< 0.147	U	< 0.147	U	ND or <QL	0.494	J	0.494	J	ND or <QL
08A-0006-C1GS	217	J	306	JF	*1.410	44.8		64	F	*1.429	51.2		51.2		None	33.3		33.3		None	12.7	J	12.7	J	ND or <QL
08A-0006-C1HS	< 159	U	< 159	U	ND or <QL	24.4	J	24.4	J	ND or <QL	40.4		40.4		None	19.4		19.4		None	9.09	J	9.09	J	ND or <QL
08A-0006-C1IS	< 395	U	< 395	U	ND or <QL	33.6	J	33.6	J	ND or <QL	61.3		61.3		None	27.5		27.5		None	18.6	J	18.6	J	ND or <QL
08A-0006-C1JS	628		884	F	*1.408	< 10.9	U	< 10.9	U	ND or <QL	89.1		89.1		None	9.66	J	9.66	J	ND or <QL	25.9		25.9		None
08A-0006-C1KS	< 166	U	< 166	U	ND or <QL	< 20.3	U	< 20.3	U	ND or <QL	< 31.1	U	< 31.1	U	ND or <QL	16.4	J	16.4	J	ND or <QL	9.31	J	9.31	J	ND or <QL
08A-0007-C2AS	2660	J	3750	JF	*1.410	768	J	1100	JF	*1.432	593	J	593	J	None	460	J	460	J	None	128	J	128	J	None
08A-0007-C2BS	3380	J	4760	JF	*1.408	919	J	1310	JF	*1.425	796	J	796	J	None	688	J	688	J	None	189	J	189	J	None
08A-0007-C2CS	1340	J	1890	JF	*1.410	412	J	589	JF	*1.430	307	J	307	J	None	352	J	352	J	None	72.3	J	72.3	J	None
08A-0007-C2DS	< 128	U	< 128	U	ND or <QL	< 26.8	U	< 26.8	U	ND or <QL	< 23.0	U	< 23.0	U	ND or <QL	20.4	J	20.4	J	ND or <QL	5.98	J	5.98	J	ND or <QL
08A-0007-C2ES	< 13.6	U	< 13.6	U	ND or <QL	< 0.621	UJ	< 0.621	UJ	ND or <QL	< 1.63	U	< 1.63	U	ND or <QL	< 0.125	U	< 0.125	U	ND or <QL	< 0.0807	U	< 0.0807	U	ND or <QL
08A-0007-C2FS	< 7.09	U	< 7.09	U	ND or <QL	< 0.606	U	< 0.606	U	ND or <QL	< 1.96	U	< 1.96	U	ND or <QL	< 0.635	U	< 0.635	U	ND or <QL	< 0.0936	U	< 0.0936	U	ND or <QL
08A-0007-C2GS	< 149	U	< 149	U	ND or <QL	31.6	J	31.6	J	ND or <QL	< 25.8	U	< 25.8	U	ND or <QL	16.3	J	16.3	J	ND or <QL	0.874	J	0.874	J	ND or <QL
08A-0007-C2HS	< 143	U	< 143	U	ND or <QL	< 19.8	U	< 19.8	U	ND or <QL	< 25.9	U	< 25.9	U	ND or <QL	19.7	J	19.7	J	ND or <QL	6	J	6	J	ND or <QL
08A-0007-C2IS	< 53.0	U	< 53.0	U	ND or <QL	< 2.92	U	< 2.92	U	ND or <QL	< 9.25	U	< 9.25	U	ND or <QL	< 2.73	U	< 2.73	U	ND or <QL	0.355	J	0.355	J	ND or <QL
08A-0007-C2JS	< 16.0	U	< 16.0	U	ND or <QL	< 1.23	U	< 1.23	U	ND or <QL	< 2.52	U	< 2.52	U	ND or <QL	< 1.35	U	< 1.35	U	ND or <QL	1.03	J	1.03	J	ND or <QL
08A-0007-C2KS	< 6.77	U	< 6.77	U	ND or <QL	< 8.76	U	< 8.76	U	ND or <QL	< 2.63	U	< 2.63	U	ND or <QL	< 3.39	U	< 3.39	U	ND or <QL	< 0.0843	U	< 0.0843	U	ND or <QL
08A-0007-C2LS	59		83.1	F	*1.408	< 1.21	U	< 1.21	U	ND or <QL	< 9.30	U	< 9.30	U	ND or <QL	< 1.06	U	< 1.06	U	ND or <QL	2.18	J	2.18	J	ND or <QL
08A-0008-C1AS	3290	J	4630	JF	*1.407	850	J	1210	JF	*1.424	710	J	710	J	None	511	J	511	J	None	136	J	136	J	None
08A-0008-C1BS	3780	J	5320	JF	*1.407	860	J	1230	JF	*1.430	770	J	770	J	None	544	J	544	J	None	152	J	152	J	None
08A-0008-C1CS	4490	J	6320	JF	*1.408	1020	J	1460	JF	*1.431	918	J	918	J	None	699	J	699	J	None	190	J	190	J	None
08A-0008-C1DS	4530	J	6380	JF	*1.408	1070	J	1530	JF	*1.430	959	J	959	J	None	768	J	768	J	None	245	J	245	J	None
08A-0008-C1ES	5920	J	8340	JF	*1.409	1190	J	1700	JF	*1.429	1230	J	1230	J	None	872	J	872	J	None	294	J	294	J	None
08A-0008-C1ET	5110	J	7190	JF	*1.407	1310	J	1870	JF	*1.427	1090	J	1090	J	None	859	J	859	J	None	243	J	243	J	None
08A-0008-C1FS	5050	J	7110	JF	*1.408	1180	J	1690	JF	*1.432	1050	J	1050	J	None	859	J	859	J	None	232	J	232	J	None
08A-0008-C1GS	4640		6530	F	*1.407	868		1240	F	*1.429	391		391		None	872		872		None	169		169		None
08A-0008-C1HS	5470		7700	F	*1.408	1290		1840	F	*1.426	1190		1190		None	889		889		None	272		272		None
08A-0008-C1IS	8240	J	11600	JF	*1.408	1360	J	1940	JF	*1.426	1810	J	1810	J	None	951	J	951	J	None	390	J	390	J	None
08A-0008-C1JS	13300		18700	F	*1.406	3160		4520	F	*1.430	2600		2600		None	1820		1820		None	1070		1070		None
08A-0008-C1KS	1300		1830	F	*1.408	1960		2800	F	*1.429	317		317		None	1500		1500		None	158		158		None
08A-0009-C3AS	5520	J	7770	JF	*1.408	793	J	1130	JF	*1.425	1210	J	1210	J	None	623	J	623	J	None	216	J	216	J	None
08A-0009-C3BS	1070	J	1510	JF	*1.411	162	J	231	JF	*1.426	261	J	261	J	None	141	J	141	J	None	54.7	J	54.7	J	None
08A-0009-C3CS	5600	J	7880	JF	*1.407	1670	J	2390	JF	*1.431	1190	J	1190	J	None	1120	J	1120	J	None	269	J	269	J	None
08A-0009-C3DS	5740	J	8080	JF	*1.408	1590	J	2270	JF	*1.428	1220	J	1220	J	None	1070	J	1070	J	None	277	J	277	J	None
08A-0009-C3ES	834	J	1170	JF	*1.403	170	J	243	JF	*1.429	224	J	224	J	None	147	J	147	J	None	49.3	J	49.3	J	None
08A-0009-C3FS	2740	J	3860	JF	*1.409	868	J	1240	JF	*1.429	661	J	661	J	None	644	J	644	J	None	165	J	165	J	None
08A-0009-C3GS	8690	J	12200	JF	*1.404	1570	J	2240	JF	*1.427	1940	J	1940	J	None	1200	J	1200	J	None	496	J	496	J	None
08A-0009-C3HS	11600	J	16300	JF	*1.405	1610	J	2300	JF	*1.429	2540	J	2540	J	None	1220	J	1220	J	None	649	J	649	J	None
08A-0009-C3IS	29200	J	41100	JF	*1.408	8290	J	11800	JF	*1.423	4080	J	4080	J	None	4140	J	4140	J	None	986	J	986	J	None
08A-0010-C2AS	3200	J	4510	JF	*1.409	705	J	1010	JF	*1.433	848	J	848	J	None	522	J	522	J	None	127	J	127	J	None
08A-0010-C2BS	6390	J	9000	JF	*1.408	908	J	1300	JF	*1.432	1330	J	1330	J	None	718	J	718	J	None	214	J	214	J	None
08A-0010-C2CS	2960	J	4170	JF	*1.409	399	J	570	JF	*1.429	668	J	668	J	None	303	J	303	J	None	121	J	121	J	None
08A-0010-C2DS	1760	J	2480	JF	*1.409	311	J	444	JF	*1.428	403	J	403	J	None	249	J	249	J	None	80.3	J	80.3	J	None
08A-0010-C2ES	2390	J	3370	JF	*1.410	423	J	604	JF	*1.428	542	J	542	J	None	353	J	353	J	None	107	J	107	J	None
08A-0010-C2ET	2390	J	3370	JF	*1.410	718	J	1030	JF	*1.435	647	J	647	J	None	508	J	508	J	None	132	J	132	J	None
08A-0010-C2FS	828	J	1170	JF	*1.413	175	J	250	JF	*1.429	216	J	216	J	None	158	J	158	J	None	43.8	J	43.8	J	None
08A-0010-C2GS	425	J	598	JF	*1.407	119	J	170	JF	*1.429	107	J	107	J	None	103	J	103	J	None	20	J	20	J	ND or <QL
08A-0010-C2HS	6550	J	9220	JF	*1.408	1490	J	2130	JF	*1.430	1570	J	1570	J	None	1230	J	1230	J	None	337	J	337	J	None
08A-0010-C2IS	9600	J	13500	JF	*1.406	1770	J	2530	JF	*1.429	2640	J	2640	J	None	1260	J	1260	J	None	512	J	512	J	None
08A-0010-C2JS	12300		17300	F	*1.407	2160		3090	F	*1.431	3030		3030		None	1380		1380		None	585		585		None
08A-0010-C2KS	15200		21400	F	*1.408	1940		2770	F	*1.428	3140		3140		None	1280		1280		None	698		698		None
08A-0010-C2LS	18200	J	25600	JF	*1.407	2460	J	3520	JF	*1.431	4030	J	4030	J	None	1600	J	1600	J	None	906	J	906	J	None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	OCDD 3268-87-9 ng/kg					OCDF 39001-02-0 ng/kg					Total HpCDD HPCDD ng/kg					Total HpCDF HPCDF ng/kg					Total HxCDD HXCDD ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0010-C2MS	1900	J	2680	JF	*1.411	350	J	500	JF	*1.429	490	J	490	J	None	217	J	217	J	None	140	J	140	J	None
08A-0011-C1AS	3320	J	4670	JF	*1.407	1170	J	1670	JF	*1.427	746	J	746	J	None	825	J	825	J	None	184	J	184	J	None
08A-0011-C1BS	225		317	F	*1.409	79.4		113	F	*1.423	33		33		None	47.2		47.2		None	8.56	J	8.56	J	ND or <QL
08A-0011-C1CS	173		244	F	*1.410	< 1.57	U	< 1.57	U	ND or <QL	< 20.7	U	< 20.7	U	ND or <QL	< 0.715	U	< 0.715	U	ND or <QL	5.59	J	5.59	J	ND or <QL
08A-0011-C1DS	150		211	F	*1.407	< 0.364	U	< 0.364	U	ND or <QL	< 12.3	U	< 12.3	U	ND or <QL	< 0.129	U	< 0.129	U	ND or <QL	3.33	J	3.33	J	ND or <QL
08A-0011-C1ES	110		155	F	*1.409	10.4	J	10.4	J	ND or <QL	< 8.56	U	< 8.56	U	ND or <QL	< 1.90	U	< 1.90	U	ND or <QL	2.54	J	2.54	J	ND or <QL
08A-0011-C1ET	111		156	F	*1.405	< 0.360	U	< 0.360	U	ND or <QL	< 12.3	U	< 12.3	U	ND or <QL	< 0.155	U	< 0.155	U	ND or <QL	< 0.213	U	< 0.213	U	ND or <QL
08A-0011-C1FS	469	J	660	JF	*1.407	39.8	J	39.8	J	ND or <QL	106		106		None	28	J	28	J	None	4.07	J	4.07	J	ND or <QL
08A-0011-C1GS	261		367	F	*1.406	< 1.03	UJ	< 1.03	UJ	ND or <QL	33.3		33.3		None	< 0.192	U	< 0.192	U	ND or <QL	11.2	J	11.2	J	ND or <QL
08A-0011-C1HS	602		848	F	*1.409	< 4.35	U	< 4.35	U	ND or <QL	79.4		79.4		None	< 1.76	U	< 1.76	U	ND or <QL	30.4		30.4		None
08A-0011-C1IS	951		1340	F	*1.409	< 0.500	U	< 0.500	U	ND or <QL	119		119		None	< 0.156	U	< 0.156	U	ND or <QL	37.9		37.9		None
08A-0011-C1JS	600		845	F	*1.408	< 0.239	U	< 0.239	U	ND or <QL	69.7		69.7		None	< 0.125	U	< 0.125	U	ND or <QL	20.8	J	20.8	J	ND or <QL
08A-0011-C1KS	887		1250	F	*1.409	< 0.402	U	< 0.402	U	ND or <QL	95.9		95.9		None	< 0.134	U	< 0.134	U	ND or <QL	29.6		29.6		None
08A-0011-C1LS	989		1390	F	*1.405	< 0.292	U	< 0.292	U	ND or <QL	86.8		86.8		None	< 0.110	U	< 0.110	U	ND or <QL	26.4		26.4		None
08A-0011-C1MS	694		977	F	*1.408	< 0.259	U	< 0.259	U	ND or <QL	78.1		78.1		None	< 0.284	U	< 0.284	U	ND or <QL	24.5		24.5		None
08A-0012-C1AS	2550	J	3590	JF	*1.408	756	J	1080	JF	*1.429	640	J	640	J	None	482	J	482	J	None	134	J	134	J	None
08A-0012-C1BS	3850	J	5420	JF	*1.408	1590	J	2270	JF	*1.428	930	J	930	J	None	531	J	531	J	None	132	J	132	J	None
08A-0012-C1CS	750	J	1060	JF	*1.413	229	J	327	JF	*1.428	204	J	204	J	None	175	J	175	J	None	55.1	J	55.1	J	None
08A-0012-C1DS	5460	J	7690	JF	*1.408	1110	J	1590	JF	*1.432	1290	J	1290	J	None	971	J	971	J	None	287	J	287	J	None
08A-0012-C1ES	4290	J	6040	JF	*1.408	1060	J	1510	JF	*1.425	979	J	979	J	None	887	J	887	J	None	229	J	229	J	None
08A-0012-C1FS	2110	J	2970	JF	*1.408	447	J	639	JF	*1.430	495	J	495	J	None	342	J	342	J	None	105	J	105	J	None
08A-0012-C1FT	4640	J	6530	JF	*1.407	892	J	1270	JF	*1.424	952	J	952	J	None	743	J	743	J	None	250	J	250	J	None
08A-0012-C1GS	6190	J	8720	JF	*1.409	976	J	1390	JF	*1.424	3040	J	3040	J	None	1220	J	1220	J	None	1220	J	1220	J	None
08A-0012-C1HS	892	J	1260	JF	*1.413	169	J	242	JF	*1.432	216	J	216	J	None	160	J	160	J	None	59.5	J	59.5	J	None
08A-0012-C1IS	8870		12500	F	*1.409	1420		2030	F	*1.430	2230		2230		None	1140		1140		None	557		557		None
08A-0012-C1JS	3610	J	5080	JF	*1.407	713	J	1020	JF	*1.431	840	J	840	J	None	536	J	536	J	None	220	J	220	J	None
08A-0013-C2AS	3770	J	5310	JF	*1.408	760	J	1090	JF	*1.434	846	J	846	J	None	499	J	499	J	None	144	J	144	J	None
08A-0013-C2BS	5550	J	7810	JF	*1.407	2360	J	3370	JF	*1.428	1150	J	1150	J	None	1390	J	1390	J	None	188	J	188	J	None
08A-0013-C2CS	5040	J	7100	JF	*1.409	767	J	1100	JF	*1.434	1020	J	1020	J	None	605	J	605	J	None	195	J	195	J	None
08A-0013-C2DS	7620	J	10700	JF	*1.404	1020	J	1460	JF	*1.431	1370	J	1370	J	None	787	J	787	J	None	227	J	227	J	None
08A-0013-C2ES	5500	J	7740	JF	*1.407	1030	J	1470	JF	*1.427	1110	J	1110	J	None	859	J	859	J	None	234	J	234	J	None
08A-0013-C2FS	5600	J	7880	JF	*1.407	1490	J	2130	JF	*1.430	1150	J	1150	J	None	1220	J	1220	J	None	239	J	239	J	None
08A-0013-C2FT	5920	J	8340	JF	*1.409	1360	J	1940	JF	*1.426	1170	J	1170	J	None	1170	J	1170	J	None	259	J	259	J	None
08A-0013-C2GS	5350		7530	F	*1.407	1040		1490	F	*1.433	1150		1150		None	844		844		None	246		246		None
08A-0013-C2GT	5070		7140	F	*1.408	1120		1600	F	*1.429	1070		1070		None	932		932		None	247		247		None
08A-0013-C2HS	8980	J	12600	JF	*1.403	1750	J	2500	JF	*1.429	1990	J	1990	J	None	1270	J	1270	J	None	451	J	451	J	None
08A-0013-C2IS	990		1390	F	*1.404	121		173	F	*1.430	227		227		None	107		107		None	44.9		44.9		None
08A-0013-C2JS	17000	J	23900	JF	*1.406	4880	J	6970	JF	*1.428	3850	J	3850	J	None	2700	J	2700	J	None	932	J	932	J	None
08A-0014-C1AS	1650	J	2320	JF	*1.406	447	J	639	JF	*1.430	418	J	418	J	None	332	J	332	J	None	67.7	J	67.7	J	None
08A-0014-C1BS	3670	J	5170	JF	*1.409	1190	J	1700	JF	*1.429	847	J	847	J	None	1040	J	1040	J	None	194	J	194	J	None
08A-0014-C1CS	9340	J	13200	JF	*1.413	2180	J	3120	JF	*1.431	1710	J	1710	J	None	1620	J	1620	J	None	334	J	334	J	None
08A-0014-C1DS	9630	J	13600	JF	*1.412	1860	J	2660	JF	*1.430	2120	J	2120	J	None	1330	J	1330	J	None	541	J	541	J	None
08A-0014-C1ES	6740	J	9490	JF	*1.408	1580	J	2260	JF	*1.430	1580	J	1580	J	None	1110	J	1110	J	None	409	J	409	J	None
08A-0014-C1ET	1500	J	2110	JF	*1.407	291	J	416	JF	*1.430	375	J	375	J	None	219	J	219	J	None	103	J	103	J	None
08A-0014-C1FS	1340	J	1890	JF	*1.410	704	J	1010	JF	*1.435	330	J	330	J	None	445	J	445	J	None	99.3	J	99.3	J	None
08A-0014-C1GS	2030	J	2860	JF	*1.409	3330	J	4760	JF	*1.429	521	J	521	J	None	2130	J	2130	J	None	164	J	164	J	None
08A-0014-C1HS	< 217	UJ	< 217	UJ	ND or <QL	48	J	48	J	ND or <QL	66.5	J	66.5	J	None	76.7	J	76.7	J	None	1.92	J	1.92	J	ND or <QL
08A-0014-C1IS	< 205	UJ	< 205	UJ	ND or <QL	< 14.8	UJ	< 14.8	UJ	ND or <QL	< 36.5	UJ	< 36.5	UJ	ND or <QL	28.3	J	28.3	J	None	5.52	J	5.52	J	ND or <QL
08A-0014-C1JS	1590	J	2240	JF	*1.409	121	J	173	JF	*1.430	104	J	104	J	None	74.6	J	74.6	J	None	35.4	J	35.4	J	None
08A-0014-C1KS	1560		2200	F	*1.410	94.5		135	F	*1.429	93.9		93.9		None	33.4		33.4		None	29.3		29.3		None
08A-0014-C1LS	1410		1990	F	*1.411	87.5		125	F	*1.429	93.5		93.5		None	42.9		42.9		None	32.7		32.7		None
08A-0014-C1MS	< 33.0	U	< 33.0	U	ND or <QL	< 2.66	U	< 2.66	U	ND or <QL	< 7.13	U	< 7.13	U	ND or <QL	< 2.69	U	< 2.69	U	ND or <QL	< 0.164	U	< 0.164	U	ND or <QL
08A-0014-C1NS	< 6.32	U	< 6.32	U	ND or <QL	< 0.461	U	< 0.461	U	ND or <QL	< 0.655	U	< 0.655	U	ND or <QL	< 0.395	U	< 0.395	U	ND or <QL	< 0.0472	U	< 0.0472	U	ND or <QL

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	OCDD 3268-87-9 ng/kg					OCDF 39001-02-0 ng/kg					Total HpCDD HPCDD ng/kg					Total HpCDF HPCDF ng/kg					Total HxCDD HXCDD ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0015-C2AS	2820	J	3970	JF	*1.408	799	J	1140	JF	*1.427	757	J	757	J	None	518	J	518	J	None	167	J	167	J	None
08A-0015-C2BS	2640	J	3720	JF	*1.409	558	J	797	JF	*1.428	790	J	790	J	None	379	J	379	J	None	138	J	138	J	None
08A-0015-C2CS	6210	J	8740	JF	*1.407	994	J	1420	JF	*1.429	1500	J	1500	J	None	791	J	791	J	None	275	J	275	J	None
08A-0015-C2DS	9770	J	13800	JF	*1.412	1270	J	1810	JF	*1.425	2270	J	2270	J	None	1060	J	1060	J	None	378	J	378	J	None
08A-0015-C2ES	3030		4270	F	*1.409	630		900	F	*1.429	1150		1150		None	522		522		None	205		205		None
08A-0015-C2FS	6290		8860	F	*1.409	1350		1930	F	*1.430	1510		1510		None	679		679		None	317		317		None
08A-0015-C2GS	655		922	F	*1.408	83.7		120	F	*1.434	102		102		None	78.6		78.6		None	30.6		30.6		None
08A-0015-C2HS	< 28.0	U	< 28.0	U	ND or <QL	< 2.06	U	< 2.06	U	ND or <QL	< 5.51	U	< 5.51	U	ND or <QL	< 1.06	U	< 1.06	U	ND or <QL	< 1.48	U	< 1.48	U	ND or <QL
08A-0015-C2IS	291		410	F	*1.409	< 0.508	U	< 0.508	U	ND or <QL	28.4		28.4		None	< 0.253	U	< 0.253	U	ND or <QL	5.93	J	5.93	J	ND or <QL
08A-0015-C2JS	385		542	F	*1.408	< 0.649	U	< 0.649	U	ND or <QL	51.3		51.3		None	< 0.175	U	< 0.175	U	ND or <QL	12.1	J	12.1	J	ND or <QL
08A-0016-C1AS	2700	J	3800	JF	*1.407	457	J	653	JF	*1.429	547	J	547	J	None	307	J	307	J	None	95.8	J	95.8	J	None
08A-0016-C1BS	9120	J	12800	JF	*1.404	1450	J	2070	JF	*1.428	1760	J	1760	J	None	860	J	860	J	None	258	J	258	J	None
08A-0016-C1CS	6550	J	9220	JF	*1.408	877	J	1250	JF	*1.425	1270	J	1270	J	None	655	J	655	J	None	210	J	210	J	None
08A-0016-C1DS	8000	J	11300	JF	*1.413	1070	J	1530	JF	*1.430	1440	J	1440	J	None	745	J	745	J	None	245	J	245	J	None
08A-0016-C1ES	9900	J	13900	JF	*1.404	1280	J	1830	JF	*1.430	2020	J	2020	J	None	897	J	897	J	None	293	J	293	J	None
08A-0016-C1ET	6480	J	9120	JF	*1.407	1200	J	1710	JF	*1.425	1260	J	1260	J	None	878	J	878	J	None	242	J	242	J	None
08A-0016-C1FS	6360	J	8950	JF	*1.407	1100	J	1570	JF	*1.427	1280	J	1280	J	None	878	J	878	J	None	237	J	237	J	None
08A-0016-C1GS	9470	J	13300	JF	*1.404	1720	J	2460	JF	*1.430	1770	J	1770	J	None	1350	J	1350	J	None	294	J	294	J	None
08A-0016-C1HS	997	J	1400	JF	*1.404	233	J	333	JF	*1.429	240	J	240	J	None	189	J	189	J	None	40.7	J	40.7	J	None
08A-0016-C1IS	9410	J	13200	JF	*1.403	1750	J	2500	JF	*1.429	1930	J	1930	J	None	1560	J	1560	J	None	356	J	356	J	None
08A-0016-C1JS	16200	J	22800	JF	*1.407	1660	J	2370	JF	*1.428	2980	J	2980	J	None	1240	J	1240	J	None	565	J	565	J	None
08A-0016-C1KS	24000	J	33800	JF	*1.408	2570	J	3670	JF	*1.428	4450	J	4450	J	None	1670	J	1670	J	None	783	J	783	J	None
08A-0016-C1LS	17400	J	24500	JF	*1.408	3110	J	4440	JF	*1.428	3420	J	3420	J	None	1950	J	1950	J	None	761	J	761	J	None
08A-0017-C1AS	5410	J	7620	JF	*1.409	1230	J	1760	JF	*1.431	1260	J	1260	J	None	841	J	841	J	None	263	J	263	J	None
08A-0017-C1AT	5100	J	7180	JF	*1.408	1070	J	1530	JF	*1.430	1060	J	1060	J	None	817	J	817	J	None	223	J	223	J	None
08A-0017-C1BS	6490	J	6050	B	Split-Replaced	1580	J	1550	B	Split-Replaced	1280	J	1280	B	Split-Replaced	1210	J	1350	B	Split-Replaced	276	J	325	B	Split-Replaced
08A-0017-C1CS	8220	J	11600	JF	*1.411	1980	J	2830	JF	*1.429	2250	J	2250	J	None	1720	J	1720	J	None	502	J	502	J	None
08A-0017-C1DS	6670	J	6600	B	Split-Replaced	1810	J	1850	B	Split-Replaced	1460	J	1550	B	Split-Replaced	1620	J	1850	B	Split-Replaced	328	J	376	B	Split-Replaced
08A-0017-C1ES	7300	J	10300	JF	*1.411	2180	J	3120	JF	*1.431	1530	J	1530	J	None	1770	J	1770	J	None	308	J	308	J	None
08A-0017-C1FS	10000	J	14100	JF	*1.410	3320	J	4740	JF	*1.428	2080	J	2080	J	None	2710	J	2710	J	None	456	J	456	J	None
08A-0017-C1GS	6620	J	9320	JF	*1.408	2300	J	3290	JF	*1.430	1700	J	1700	J	None	1790	J	1790	J	None	384	J	384	J	None
08A-0017-C1HS	18000	J	25300	JF	*1.406	5400	J	7720	JF	*1.430	3390	J	3390	J	None	3760	J	3760	J	None	731	J	731	J	None
08A-0017-C1IS	18400	J	25900	JF	*1.408	6850	J	9790	JF	*1.429	3590	J	3590	J	None	4300	J	4300	J	None	818	J	818	J	None
08A-0017-C1JS	12400	J	17500	JF	*1.411	4520	J	6460	JF	*1.429	2370	J	2370	J	None	2610	J	2610	J	None	537	J	537	J	None
08A-0017-C1KS	1200		1690	F	*1.408	62		88.6	F	*1.429	87.6		87.6		None	32		32		None	26.1		26.1		None
08A-0017-C1LS	< 235	U	< 235	U	ND or <QL	< 24.7	U	< 24.7	U	ND or <QL	< 53.4	U	< 53.4	U	ND or <QL	29.9	J	29.9	J	ND or <QL	4.2	J	4.2	J	ND or <QL
08A-0017-C1MS	1700		2390	F	*1.406	126		180	F	*1.429	106		106		None	76.7		76.7		None	45.4		45.4		None
08A-0017-C1NS	< 54.3	U	< 54.3	U	ND or <QL	< 7.46	U	< 7.46	U	ND or <QL	< 8.40	U	< 8.40	U	ND or <QL	< 6.53	U	< 6.53	U	ND or <QL	< 1.78	U	< 1.78	U	ND or <QL
08A-0017-C1OS	< 12.8	U	< 12.8	U	ND or <QL	< 1.60	U	< 1.60	U	ND or <QL	< 3.50	U	< 3.50	U	ND or <QL	< 1.73	U	< 1.73	U	ND or <QL	< 0.600	U	< 0.600	U	ND or <QL
08A-0018-C1AS	2150	J	3030	JF	*1.409	959	J	1370	JF	*1.429	511	J	511	J	None	749	J	749	J	None	109	J	109	J	None
08A-0018-C1BS	1630	J	2300	JF	*1.411	259	J	370	JF	*1.429	380	J	380	J	None	223	J	223	J	None	77.4	J	77.4	J	None
08A-0018-C1CS	627	J	883	JF	*1.408	107	J	153	JF	*1.430	165	J	165	J	None	119	J	119	J	None	29.6	J	29.6	J	ND or <QL
08A-0018-C1DS	1840	J	2590	JF	*1.408	519	J	742	JF	*1.430	418	J	418	J	None	569	J	569	J	None	126	J	126	J	None
08A-0018-C1ES	4210	J	5930	JF	*1.409	1730	J	2470	JF	*1.428	988	J	988	J	None	1760	J	1760	J	None	555	J	555	J	None
08A-0018-C1FS	2730		3840	F	*1.407	517		739	F	*1.429	849		849		None	788		788		None	795		795		None
08A-0018-C1GS	420		591	F	*1.407	13.6	J	13.6	J	ND or <QL	50.3		50.3		None	21.1		21.1		None	20		20		None
08A-0018-C1HS	< 29.5	U	< 29.5	U	ND or <QL	< 0.551	UJ	< 0.551	UJ	ND or <QL	< 8.61	U	< 8.61	U	ND or <QL	< 0.359	U	< 0.359	U	ND or <QL	0.701	J	0.701	J	ND or <QL
08A-0018-C1IS	< 48.2	U	< 48.2	U	ND or <QL	< 0.269	UJ	< 0.269	UJ	ND or <QL	< 8.64	U	< 8.64	U	ND or <QL	< 0.477	U	< 0.477	U	ND or <QL	1.32	J	1.32	J	ND or <QL
08A-0019-C3AS	3300	J	4650	JF	*1.409	758	J	1080	JF	*1.425	1070	J	1070	J	None	593	J	593	J	None	196	J	196	J	None
08A-0019-C3BS	6210	J	6530	B	Split-Replaced	996	J	1140	B	Split-Replaced	1320	J	1400	B	Split-Replaced	866	J	1030	B	Split-Replaced	301	J	359	B	Split-Replaced
08A-0019-C3CS	8730	J	14100	B	Split-Replaced	1430	J	2670	B	Split-Replaced	1880	J	3090	B	Split-Replaced	1010	J	2240	B	Split-Replaced	415	J	900	B	Split-Replaced
08A-0019-C3DS	12800	J	13200	B	Split-Replaced	3710	J	2490	B	Split-Replaced	2850	J	2870	B	Split-Replaced	2460	J	2110	B	Split-Replaced	770	J	915		Split-Replaced
08A-0019-C3ES	428	J	603	JF	*1.409	86.2	J	86.2	J	ND or <QL	124	J	124	J	None	71.3	J	71.3	J	None	38.2	J	38.2	J	ND or <QL

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	OCDD 3268-87-9 ng/kg					OCDF 39001-02-0 ng/kg					Total HpCDD HPCDD ng/kg					Total HpCDF HPCDF ng/kg					Total HxCDD HXCDD ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0019-D1AS	5500	J	7740	JF	*1.407	878	J	1250	JF	*1.424	1270	J	1270	J	None	671	J	671	J	None	238	J	238	J	None
08A-0019-D1BS	3690	J	5200	JF	*1.409	459	J	656	JF	*1.429	1350	J	1350	J	None	402	J	402	J	None	151	J	151	J	None
08A-0019-D1CS	4300	J	6050	JF	*1.407	1360	J	1940	JF	*1.426	802	J	802	J	None	778	J	778	J	None	127	J	127	J	None
08A-0019-D1DS	4800	J	6760	JF	*1.408	903	J	1290	JF	*1.429	1050	J	1050	J	None	692	J	692	J	None	213	J	213	J	None
08A-0019-D1ES	11600	J	16300	JF	*1.405	1620	J	2310	JF	*1.426	3450	J	3450	J	None	1230	J	1230	J	None	575	J	575	J	None
08A-0020-C2AS	2880	J	4060	JF	*1.410	653	J	933	JF	*1.429	652	J	652	J	None	524	J	524	J	None	170	J	170	J	None
08A-0020-C2BS	5040	J	7100	JF	*1.409	1230	J	1760	JF	*1.431	1100	J	1100	J	None	1040	J	1040	J	None	287	J	287	J	None
08A-0020-C2BT	1570	J	2210	JF	*1.408	433	J	619	JF	*1.430	346	J	346	J	None	372	J	372	J	None	59	J	59	J	None
08A-0020-C2CS	5290	J	10900	B	Split-Replaced	2290	J	3090	B	Split-Replaced	1420	J	2730	B	Split-Replaced	1260	J	2470	B	Split-Replaced	477	J	734	B	Split-Replaced
08A-0020-C2DS	5260	J	22000	B	Split-Replaced	1320	J	4740	B	Split-Replaced	1140	J	4670	B	Split-Replaced	968	J	4130	B	Split-Replaced	296	J	1060	B	Split-Replaced
08A-0020-C2ES	12300	J	32600	B	Split-Replaced	5050	J	9700	B	Split-Replaced	2330	J	6420	B	Split-Replaced	3120	J	7870	B	Split-Replaced	605	J	1490	B	Split-Replaced
08A-0020-C2FS	2460	J	3460	JF	*1.407	1920	J	2740	JF	*1.427	652	J	652	J	None	1710	J	1710	J	None	218	J	218	J	None
08A-0020-C2FT	7000	J	9860	JF	*1.409	5240	J	7490	JF	*1.429	1630	J	1630	J	None	5130	J	5130	J	None	368	J	368	J	None
08A-0020-C2GS	673	J	948	JF	*1.409	94.3	J	135	JF	*1.432	84.2	J	84.2	J	None	133	J	133	J	None	36.3	J	36.3	J	None
08A-0020-C2HS	356	J	501	JF	*1.407	15.8	J	15.8	J	ND or <QL	32.6		32.6		None	12.2	J	12.2	J	ND or <QL	14.6	J	14.6	J	ND or <QL
08A-0021-C1AS	4190	J	5900	JF	*1.408	1020	J	1460	JF	*1.431	881	J	881	J	None	963	J	963	J	None	195	J	195	J	None
08A-0021-C1BS	6080		8560	F	*1.408	1790	J	2560	JF	*1.430	1480		1480		None	1000		1000		None	504		504		None
08A-0021-C1CS	6710		9450	F	*1.408	1850		2640	F	*1.427	1450		1450		None	292		292		None	313		313		None
08A-0021-C1DS	20300	J	28600	JF	*1.409	2470	J	3530	JF	*1.429	3390	J	3390	J	None	1850	J	1850	J	None	776	J	776	J	None
08A-0021-C1ES	27700	J	39000	JF	*1.408	10100	J	14400	JF	*1.426	4700	J	4700	J	None	6200	J	6200	J	None	1200	J	1200	J	None
08A-0021-C1FS	20800	J	29300	JF	*1.409	65800	J	94000	JF	*1.429	4260	J	4260	J	None	21000	J	21000	J	None	1380	J	1380	J	None
08A-0021-C1FT	17500	J	24600	JF	*1.406	59700	J	85300	JF	*1.429	3870	J	3870	J	None	25800	J	25800	J	None	1220	J	1220	J	None
08A-0021-C1GS	31200	J	43900	JF	*1.407	1370	J	1960	JF	*1.431	24700	J	24700	J	None	6600	J	6600	J	None	32200	J	32200	J	None
08A-0021-C1HS	4950		6970	F	*1.408	1440		2060	F	*1.431	951		951		None	2650		2650		None	272		272		None
08A-0022-C1AS	5860	J	8250	JF	*1.408	2900	J	4140	JF	*1.428	1120	J	1120	J	None	882	J	882	J	None	260	J	260	J	None
08A-0022-C1BS	6640	J	9350	JF	*1.408	2000	J	2860	JF	*1.430	1550	J	1550	J	None	2150	J	2150	J	None	379	J	379	J	None
08A-0022-C1CS	16400	J	23100	JF	*1.409	3760	J	5370	JF	*1.428	4450	J	4450	J	None	3020	J	3020	J	None	1400	J	1400	J	None
08A-0022-C1DS	17200		24200	F	*1.407	23500		33600	F	*1.430	1600		1600		None	2910		2910		None	554		554		None
08A-0022-C1ES	1550		2180	F	*1.406	23.4	J	23.4	J	ND or <QL	118		118		None	14.7	J	14.7	J	ND or <QL	27.9		27.9		None
08A-0022-C1FS	759		1070	F	*1.410	< 6.64	U	< 6.64	U	ND or <QL	125		125		None	< 4.76	U	< 4.76	U	ND or <QL	39.5		39.5		None
08A-0022-C1GS	844		1190	F	*1.410	< 2.45	U	< 2.45	U	ND or <QL	162		162		None	< 2.64	U	< 2.64	U	ND or <QL	47.4		47.4		None
08A-0022-C1HS	825		1160	F	*1.406	< 12.3	U	< 12.3	U	ND or <QL	150		150		None	9.91	J	9.91	J	ND or <QL	51.9		51.9		None
08A-0022-C1IS	1310		1840	F	*1.405	25.6	J	25.6	J	ND or <QL	235		235		None	27.3		27.3		None	48.8		48.8		None
08A-0022-C1JS	142		200	F	*1.408	14.6	J	14.6	J	ND or <QL	< 18.6	U	< 18.6	U	ND or <QL	< 1.07	U	< 1.07	U	ND or <QL	4.77	J	4.77	J	ND or <QL
08A-0022-D2AS	7440	J	10500	JF	*1.411	1090	J	1560	JF	*1.431	1600	J	1600	J	None	870	J	870	J	None	290	J	290	J	None
08A-0022-D2BS	2040	J	2870	JF	*1.407	532	J	760	JF	*1.429	492	J	492	J	None	403	J	403	J	None	88.4	J	88.4	J	None
08A-0022-D2CS	3170	J	4460	JF	*1.407	667	J	953	JF	*1.429	743	J	743	J	None	581	J	581	J	None	178	J	178	J	None
08A-0022-D2DS	7080	J	9970	JF	*1.408	2090	J	2990	JF	*1.431	1650	J	1650	J	None	2270	J	2270	J	None	448	J	448	J	None
08A-0022-D2ES	14700	J	20700	JF	*1.408	4560	J	6520	JF	*1.430	3470	J	3470	J	None	6500	J	6500	J	None	1150	J	1150	J	None
08A-0023-C2AS	3860	J	5430	JF	*1.407	598	J	855	JF	*1.430	861	J	861	J	None	492	J	492	J	None	173	J	173	J	None
08A-0023-C2BS	7340	J	10300	JF	*1.403	1050	J	1500	JF	*1.429	1580	J	1580	J	None	1000	J	1000	J	None	274	J	274	J	None
08A-0023-C2CS	10700	J	15100	JF	*1.411	1870	J	2670	JF	*1.428	1850	J	1850	J	None	1360	J	1360	J	None	329	J	329	J	None
08A-0023-C2DS	11500	J	16200	JF	*1.409	1320	J	1890	JF	*1.432	2400	J	2400	J	None	1130	J	1130	J	None	569	J	569	J	None
08A-0023-C2ES	15400	J	21700	JF	*1.409	2380	J	3400	JF	*1.429	2850	J	2850	J	None	1890	J	1890	J	None	641	J	641	J	None
08A-0023-C2FS	15300	J	21500	JF	*1.405	3900	J	5570	JF	*1.428	2610	J	2610	J	None	2600	J	2600	J	None	553	J	553	J	None
08A-0023-C2GS	11700	J	16500	JF	*1.410	5160	J	7370	JF	*1.428	1930	J	1930	J	None	3380	J	3380	J	None	374	J	374	J	None
08A-0023-C2HS	20400	J	28700	JF	*1.407	14400	J	20600	JF	*1.431	4240	J	4240	J	None	8180	J	8180	J	None	1380	J	1380	J	None
08A-0023-C2IS	5580	J	7860	JF	*1.409	2190	J	3130	JF	*1.429	1210	J	1210	J	None	3060	J	3060	J	None	378	J	378	J	None
08A-0023-C2JS	937		1320	F	*1.409	< 72.2	U	< 72.2	U	ND or <QL	96.3		96.3		None	91.3		91.3		None	57.1		57.1		None
08A-0024-C1AS	5200	J	7320	JF	*1.408	1010	J	1440	JF	*1.426	1110	J	1110	J	None	753	J	753	J	None	250	J	250	J	None
08A-0024-C1BS	20500	J	28900	JF	*1.410	2700	J	3860	JF	*1.430	3800	J	3800	J	None	1870	J	1870	J	None	996	J	996	J	None
08A-0024-C1CS	20300	J	28600	JF	*1.409	4570	J	6530	JF	*1.429	3800	J	3800	J	None	2660	J	2660	J	None	924	J	924	J	None
08A-0024-C1DS	17700	J	24900	JF	*1.407	7640	J	10900	JF	*1.427	3460	J	3460	J	None	4860	J	4860	J	None	959	J	959	J	None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	OCDD 3268-87-9 ng/kg					OCDF 39001-02-0 ng/kg					Total HpCDD HPCDD ng/kg					Total HpCDF HPCDF ng/kg					Total HxCDD HXCDD ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0024-C1ES	10900	J	15300	JF	*1.404	11100	J	15900	JF	*1.432	2340	J	2340	J	None	6050	J	6050	J	None	795	J	795	J	None
08A-0024-C1FS	10700	J	15100	JF	*1.411	12300	J	17600	JF	*1.431	2510	J	2510	J	None	8140	J	8140	J	None	894	J	894	J	None
08A-0024-C1FT	12000	J	16900	JF	*1.408	11800	J	16900	JF	*1.432	2950	J	2950	J	None	7540	J	7540	J	None	1140	J	1140	J	None
08A-0024-C1GS	1780		2510	F	*1.410	343		490	F	*1.429	269		269		None	521		521		None	91.4		91.4		None
08A-0024-C1HS	772		1090	F	*1.412	42.2		60.3	F	*1.429	50.2		50.2		None	31.6		31.6		None	19.7		19.7		None
08A-0025-C1AS	647	J	911	JF	*1.408	107	J	153	JF	*1.430	167	J	167	J	None	101	J	101	J	None	17.5	J	17.5	J	ND or <QL
08A-0025-C1BS	1180	J	1660	JF	*1.407	182	J	260	JF	*1.429	276	J	276	J	None	152	J	152	J	None	45.2	J	45.2	J	None
08A-0025-C1CS	2580	J	3630	JF	*1.407	1240	J	1770	JF	*1.427	470	J	470	J	None	360	J	360	J	None	92.2	J	92.2	J	None
08A-0025-C1DS	3780		5320	F	*1.407	838		1200	F	*1.432	695		695		None	496		496		None	158		158		None
08A-0025-C1ES	22200	J	31300	JF	*1.410	4190	J	5990	JF	*1.430	4020	J	4020	J	None	2680	J	2680	J	None	945	J	945	J	None
08A-0025-C1ET	26200	J	36900	JF	*1.408	4050	J	5790	JF	*1.430	4410	J	4410	J	None	2760	J	2760	J	None	1040	J	1040	J	None
08A-0025-C1FS	15900	J	22400	JF	*1.409	7550	J	10800	JF	*1.430	3130	J	3130	J	None	5300	J	5300	J	None	1070	J	1070	J	None
08A-0025-C1GS	2200		3100	F	*1.409	110		157	F	*1.427	121		121		None	107		107		None	58.8		58.8		None
08A-0026-C1AS	4350	J	6120	JF	*1.407	1260	J	1800	JF	*1.429	1060	J	1060	J	None	790	J	790	J	None	201	J	201	J	None
08A-0026-C1BS	7660	J	10800	JF	*1.410	3550	J	5070	JF	*1.428	1800	J	1800	J	None	2520	J	2520	J	None	442	J	442	J	None
08A-0026-C1CS	2250	J	3170	JF	*1.409	208	J	297	JF	*1.428	595	J	595	J	None	179	J	179	J	None	180	J	180	J	None
08A-0026-C1DS	111		156	F	*1.405	< 6.47	U	< 6.47	U	ND or <QL	21.4	J	21.4	J	ND or <QL	5.34	J	5.34	J	ND or <QL	2.14	J	2.14	J	ND or <QL
08A-0026-C1ES	175		904	B	Split-Replaced	< 0.584	UJ	< 1.23	U	Split-Replaced	26.2		119		Split-Replaced	< 0.245	U	0.603	BJ	Split-Replaced	10.8	J	44.8	B	Split-Replaced
08A-0027-C1AS	983	J	1380	JF	*1.404	245	J	350	JF	*1.429	247	J	247	J	None	209	J	209	J	None	67.6	J	67.6	J	None
08A-0027-C1BS	1800	J	2530	JF	*1.406	282	J	403	JF	*1.429	403	J	403	J	None	248	J	248	J	None	83.9	J	83.9	J	None
08A-0027-C1CS	1040	J	1460	JF	*1.404	161	J	230	JF	*1.429	194	J	194	J	None	166	J	166	J	None	53	J	53	J	None
08A-0027-C1DS	7760	J	10900	JF	*1.405	1520	J	2170	JF	*1.428	1520	J	1520	J	None	1310	J	1310	J	None	332	J	332	J	None
08A-0027-C1ES	2000	J	2820	JF	*1.410	352	J	503	JF	*1.429	473	J	473	J	None	294	J	294	J	None	139	J	139	J	None
08A-0027-C1FS	10200	J	14400	JF	*1.412	1490	J	2130	JF	*1.430	2400	J	2400	J	None	1050	J	1050	J	None	937	J	937	J	None
08A-0027-C1GS	22000		31000	F	*1.409	4380		6260	F	*1.429	3800		3800		None	2870		2870		None	795		795		None
08A-0027-C1HS	4270	J	6010	JF	*1.407	2290	J	3270	JF	*1.428	879	J	879	J	None	1460	J	1460	J	None	226	J	226	J	None
08A-0027-C1IS	4240		5970	F	*1.408	2080		2970	F	*1.428	963		963		None	1800		1800		None	278		278		None
08A-0028-C2AS	4080	J	5740	JF	*1.407	1440	J	2060	JF	*1.431	1210	J	1210	J	None	867	J	867	J	None	207	J	207	J	None
08A-0028-C2BS	3820	J	5380	JF	*1.408	741	J	1060	JF	*1.430	846	J	846	J	None	563	J	563	J	None	174	J	174	J	None
08A-0028-C2CS	7850	J	11100	JF	*1.414	1120	J	1600	JF	*1.429	1440	J	1440	J	None	963	J	963	J	None	255	J	255	J	None
08A-0028-C2DS	5050	J	7110	JF	*1.408	837	J	1200	JF	*1.434	1010	J	1010	J	None	677	J	677	J	None	234	J	234	J	None
08A-0028-C2ES	12300	J	17300	JF	*1.407	1920	J	2740	JF	*1.427	2310	J	2310	J	None	1360	J	1360	J	None	514	J	514	J	None
08A-0028-C2FS	23300	J	32800	JF	*1.408	8650	J	12400	JF	*1.434	4090	J	4090	J	None	4650	J	4650	J	None	1110	J	1110	J	None
08A-0028-C2GS	1150		1620	F	*1.409	59.2		84.6	F	*1.429	84.6		84.6		None	46		46		None	36.7		36.7		None
08A-0028-D1AS	2730		3840	F	*1.407	499		713	F	*1.429	586		586		None	300		300		None	92.7		92.7		None
08A-0028-D1BS	5520	J	7770	JF	*1.408	1150	J	1640	JF	*1.426	1250	J	1250	J	None	816	J	816	J	None	231	J	231	J	None
08A-0028-D1CS	5920	J	8340	JF	*1.409	1350	J	1930	JF	*1.430	1330	J	1330	J	None	1030	J	1030	J	None	255	J	255	J	None
08A-0028-D1DS	3340	J	4700	JF	*1.407	478	J	683	JF	*1.429	772	J	772	J	None	447	J	447	J	None	189	J	189	J	None
08A-0028-D1DT	7250	J	10200	JF	*1.407	944	J	1350	JF	*1.430	1730	J	1730	J	None	836	J	836	J	None	313	J	313	J	None
08A-0028-D1ES	2690	J	3790	JF	*1.409	951	J	1360	JF	*1.430	657	J	657	J	None	720	J	720	J	None	143	J	143	J	None
08A-0029-C1AS	3330	J	4690	JF	*1.408	425	J	607	JF	*1.428	642	J	642	J	None	370	J	370	J	None	153	J	153	J	None
08A-0029-C1AT	14800	J	20800	JF	*1.405	1480	J	2110	JF	*1.426	2400	J	2400	J	None	1100	J	1100	J	None	470	J	470	J	None
08A-0029-C1BS	12800	J	18000	JF	*1.406	2400	J	3430	JF	*1.429	2500	J	2500	J	None	1880	J	1880	J	None	599	J	599	J	None
08A-0029-C1CS	6980	J	9830	JF	*1.408	2560	J	3660	JF	*1.430	1650	J	1650	J	None	1640	J	1640	J	None	456	J	456	J	None
08A-0029-C1CT	16000	J	22500	JF	*1.406	5140	J	7350	JF	*1.430	3390	J	3390	J	None	1630	J	1630	J	None	973	J	973	J	None
08A-0029-C1DS	8800	J	12400	JF	*1.409	3900	J	5570	JF	*1.428	1680	J	1680	J	None	2380	J	2380	J	None	480		480		None
08A-0029-C1ES	9000		12700	F	*1.411	2650		3790	F	*1.430	1670		1670		None	2310		2310		None	532		532		None
08A-0029-C1FS	10800		15200	F	*1.407	1770		2530	F	*1.429	2150		2150		None	3000		3000		None	548		548		None
08A-0029-C1GS	1150		1620	F	*1.409	43.5	J	43.5	J	ND or <QL	118		118		None	36.2		36.2		None	70.3		70.3		None
08A-0030-C1AS	4400	J	6200	JF	*1.409	843	J	1200	JF	*1.423	990	J	990	J	None	633	J	633	J	None	201	J	201	J	None
08A-0030-C1BS	10100	J	14200	JF	*1.406	1390	J	1990	JF	*1.432	1980	J	1980	J	None	1110	J	1110	J	None	449	J	449	J	None
08A-0030-C1CS	8930	J	12600	JF	*1.411	3590	J	5130	JF	*1.429	1610	J	1610	J	None	2330	J	2330	J	None	365	J	365	J	None
08A-0030-C1DS	11900	J	16800	JF	*1.412	4190	J	5990	JF	*1.430	2660	J	2660	J	None	3000	J	3000	J	None	664	J	664	J	None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	OCDD 3268-87-9 ng/kg					OCDF 39001-02-0 ng/kg					Total HpCDD HPCDD ng/kg					Total HpCDF HPCDF ng/kg					Total HxCDD HXCDD ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0030-C1ES	3000	J	4220	JF	*1.407	1470	J	2100	JF	*1.429	716	J	716	J	None	1100	J	1100	J	None	256	J	256	J	None
08A-0030-C1FS	2780		3910	F	*1.406	1600		2290	F	*1.431	459		459		None	671		671		None	37.3		37.3		None
08A-0030-C1GS	24.5	J	24.5	J	ND or <QL	< 2.23	U	< 2.23	U	ND or <QL	< 3.05	U	< 3.05	U	ND or <QL	1.51	J	1.51	J	ND or <QL	< 0.118	U	< 0.118	U	ND or <QL
08A-0031-C1AS	7520	J	10600	JF	*1.410	647	J	925	JF	*1.430	3520	J	3520	J	None	510	J	510	J	None	428	J	428	J	None
08A-0031-C1BS	9020	J	12700	JF	*1.408	1280	J	1830	JF	*1.430	2050	J	2050	J	None	1240	J	1240	J	None	438	J	438	J	None
08A-0031-C1CS	2480	J	3490	JF	*1.407	362	J	517	JF	*1.428	631	J	631	J	None	401	J	401	J	None	159	J	159	J	None
08A-0031-C1DS	20700	J	29100	JF	*1.406	6580	J	9400	JF	*1.429	4290	J	4290	J	None	4100	J	4100	J	None	1000	J	1000	J	None
08A-0031-C1ES	2040	J	2870	JF	*1.407	168		240	F	*1.429	148		148		None	212		212		None	86.9		86.9		None
08A-0031-C1FS	< 14.7	U	< 14.7	U	ND or <QL	< 0.548	U	< 0.548	U	ND or <QL	< 2.07	U	< 2.07	U	ND or <QL	< 0.239	U	< 0.239	U	ND or <QL	< 0.260	U	< 0.260	U	ND or <QL
08A-0032-C2AS	1860	J	2620	JF	*1.409	328	J	469	JF	*1.430	404	J	404	J	None	268	J	268	J	None	71.6	J	71.6	J	None
08A-0032-C2BS	3130	J	4410	JF	*1.409	900	J	1290	JF	*1.433	688	J	688	J	None	601	J	601	J	None	149	J	149	J	None
08A-0032-C2CS	6590	J	9280	JF	*1.408	1190	J	1700	JF	*1.429	1440	J	1440	J	None	1100	J	1100	J	None	406	J	406	J	None
08A-0032-C2DS	18000	J	25300	JF	*1.406	2950	J	4220	JF	*1.431	3380	J	3380	J	None	2160	J	2160	J	None	757	J	757	J	None
08A-0032-C2ES	23600	J	33200	JF	*1.407	17500	J	25000	JF	*1.429	4360	J	4360	J	None	11600	J	11600	J	None	1320	J	1320	J	None
08A-0032-C2FS	1140	J	1610	JF	*1.412	882	J	1260	JF	*1.429	304	J	304	J	None	333	J	333	J	None	94.8	J	94.8	J	None
08A-0032-C2GS	1780		2510	F	*1.410	618		883	F	*1.429	414		414		None	685		685		None	155		155		None
08A-0032-C2HS	922		1300	F	*1.410	122		174	F	*1.426	188		188		None	226		226		None	49.4		49.4		None
08A-0032-C2IS	435		612	F	*1.407	32.2		46	F	*1.429	46.5		46.5		None	36.9		36.9		None	13.9		13.9		None
08A-0033-C1AS	3930	J	5530	JF	*1.407	655	J	936	JF	*1.429	849	J	849	J	None	527	J	527	J	None	169	J	169	J	None
08A-0033-C1BS	7300	J	10300	JF	*1.411	897	J	1280	JF	*1.427	1450	J	1450	J	None	805	J	805	J	None	254	J	254	J	None
08A-0033-C1CS	3350	J	4720	JF	*1.409	544	J	777	JF	*1.428	808	J	808	J	None	545	J	545	J	None	158	J	158	J	None
08A-0033-C1DS	9930	J	14000	JF	*1.410	2110	J	3020	JF	*1.431	1990	J	1990	J	None	1940	J	1940	J	None	449	J	449	J	None
08A-0033-C1ES	2700	J	3800	JF	*1.407	498	J	712	JF	*1.430	597	J	597	J	None	493	J	493	J	None	182	J	182	J	None
08A-0033-C1ET	437	J	615	JF	*1.407	66.4	J	94.9	JF	*1.429	119	J	119	J	None	83.4	J	83.4	J	None	26.8	J	26.8	J	None
08A-0034-C1AS	1340		1890	F	*1.410	194		277	F	*1.428	342		342		None	178		178		None	70.8		70.8		None
08A-0034-C1BS	3230		4550	F	*1.409	485		693	F	*1.429	889		889		None	433		433		None	152		152		None
08A-0034-C1CS	5330		7500	F	*1.407	807		1150	F	*1.425	1670		1670		None	674		674		None	340		340		None
08A-0034-D2AS	2100		2960	F	*1.410	316		452	F	*1.430	470		470		None	221		221		None	79.5		79.5		None
08A-0034-D2BS	984		1390	F	*1.413	118		169	F	*1.432	200		200		None	104		104		None	44.7		44.7		None
08A-0034-D2CS	3290		4630	F	*1.407	340		486	F	*1.429	619		619		None	306		306		None	114		114		None
08A-0034-D2DS	2820		3970	F	*1.408	361		516	F	*1.429	662		662		None	358		358		None	122		122		None
08A-0034-D2ES	2580		3630	F	*1.407	263		376	F	*1.430	803		803		None	244		244		None	134		134		None
08A-0035-C5AS	109		153	F	*1.404	15.8	J	15.8	J	ND or <QL	23.9		23.9		None	12.3	J	12.3	J	ND or <QL	5.71	J	5.71	J	ND or <QL
08A-0036-C2AS	1020		1440	F	*1.412	221		316	F	*1.430	255		255		None	182		182		None	33		33		None
08A-0036-C2BS	436		614	F	*1.408	71.6		102	F	*1.425	183		183		None	62.7		62.7		None	100		100		None
08A-0036-C2CS	7380		10400	F	*1.409	1100		1570	F	*1.427	1550		1550		None	833		833		None	289		289		None
08A-0036-C2DS	6960		9800	F	*1.408	1700		2430	F	*1.429	1340		1340		None	1080		1080		None	261		261		None
08A-0036-C2ES	11100		15600	F	*1.405	2300	J	3290	JF	*1.430	2160		2160		None	1650		1650		None	534		534		None
08A-0036-C2ET	13400		18900	F	*1.410	1770	J	2530	JF	*1.429	2290		2290		None	1280		1280		None	509		509		None
08A-0036-C2FS	6020		8480	F	*1.409	2250		3220	F	*1.431	1240		1240		None	1390		1390		None	335		335		None
08A-0036-C2GS	2920		4110	F	*1.408	3910		5590	F	*1.430	640		640		None	1840		1840		None	221		221		None
08A-0037-C1AS	3000		4220	F	*1.407	320		457	F	*1.428	902		902		None	269		269		None	149		149		None
08A-0037-C1BS	1630	J	2300	JF	*1.411	386	J	552	JF	*1.430	372	J	372	J	None	253	J	253	J	None	97.9	J	97.9	J	None
08A-0037-C1CS	4710		6630	F	*1.408	497		710	F	*1.429	1910		1910		None	353		353		None	335		335		None
08A-0037-C1DS	3000		4220	F	*1.407	306		437	F	*1.428	757		757		None	246		246		None	146		146		None
08A-0037-C1ES	3480		4900	F	*1.408	593		847	F	*1.428	802		802		None	373		373		None	95.1		95.1		None
08A-0038-C1AS	2280		3210	F	*1.408	476		680	F	*1.429	503		503		None	314		314		None	90.7		90.7		None
08A-0038-C1BS	4640		6530	F	*1.407	566		809	F	*1.429	947		947		None	489		489		None	178		178		None
08A-0038-C1CS	6780		9550	F	*1.409	971		1390	F	*1.432	1250		1250		None	699		699		None	242		242		None
08A-0038-C1DS	6780	J	9550	JF	*1.409	957	J	1370	JF	*1.432	1150	J	1150	J	None	556	J	556	J	None	257	J	257	J	None
08A-0038-C1ES	16500		10700	B	Split-Replaced	2230		1550	B	Split-Replaced	2560		2090	B	Split-Replaced	1660		1470	B	Split-Replaced	500		574	B	Split-Replaced
08A-0038-C2FS	6770		9530	F	*1.408	1320		1890	F	*1.432	1320		1320		None	1010		1010		None	248		248		None
08A-0038-C2GS	1690		2380	F	*1.408	206		294	F	*1.427	246		246		None	364		364		None	83.2		83.2		None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	OCDD 3268-87-9 ng/kg					OCDF 39001-02-0 ng/kg					Total HpCDD HPCDD ng/kg					Total HpCDF HPCDF ng/kg					Total HxCDD HXCDD ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0039-C1AS	2900		4080	F	*1.407	418		597	F	*1.428	638		638		None	350		350		None	112		112		None
08A-0039-C1BS	3290	J	4630	JF	*1.407	411	J	587	JF	*1.428	1160	J	1160	J	None	371	J	371	J	None	159	J	159	J	None
08A-0039-C1CS	3350		4720	F	*1.409	666		952	F	*1.429	827		827		None	545		545		None	161		161		None
08A-0039-C1DS	6820		9600	F	*1.408	1040		1490	F	*1.433	1600		1600		None	678		678		None	452		452		None
08A-0039-C1ES	3810		5360	F	*1.407	683		976	F	*1.429	843		843		None	500		500		None	198		198		None
08A-0039-C1FS	10300	J	14500	JF	*1.408	2500	J	3570	JF	*1.428	2170	J	2170	J	None	3230	J	3230	J	None	626	J	626	J	None
08A-0039-C1GS	8190		11500	F	*1.404	809		1160	F	*1.434	1520		1520		None	1520		1520		None	377		377		None
08A-0039-C1HS	10100	J	14200	JF	*1.406	1000	J	1430	JF	*1.430	2120	J	2120	J	None	1890	J	1890	J	None	541	J	541	J	None
08A-0040-C1AS	4340		6110	F	*1.408	847		1210	F	*1.429	803		803		None	641		641		None	180		180		None
08A-0040-C1BS	10800		15200	F	*1.407	2810		4020	F	*1.431	2200		2200		None	2010		2010		None	468		468		None
08A-0040-C1CS	8950		12600	F	*1.408	3620	J	5170	JF	*1.428	2000		2000		None	2380		2380		None	532		532		None
08A-0040-C1CT	8760		12300	F	*1.404	6150	J	8790	JF	*1.429	1960		1960		None	2510		2510		None	528		528		None
08A-0040-C1DS	6440		9070	F	*1.408	1080		1540	F	*1.426	1340		1340		None	1390		1390		None	379		379		None
08A-0040-C1ES	3580	J	5040	JF	*1.408	385	J	550	JF	*1.429	718		718		None	671		671		None	194		194		None
08A-0040-C1ET	2460	J	3460	JF	*1.407	285	J	407	JF	*1.428	524		524		None	482		482		None	167		167		None
08A-0041-C1AS	8350	J	11800	JF	*1.413	1380	J	1970	JF	*1.428	2330	J	2330	J	None	698	J	698	J	None	229	J	229	J	None
08A-0041-C1BS	25600	J	36000	JF	*1.406	589		842	F	*1.430	5160		5160		None	1590		1590		None	604		604		None
08A-0041-C1CS	1380		1940	F	*1.406	264		377	F	*1.428	310		310		None	175		175		None	83.3		83.3		None
08A-0041-C1DS	11000	J	15500	JF	*1.409	3110	J	4440	JF	*1.428	1980	J	1980	J	None	2290	J	2290	J	None	656	J	656	J	None
08A-0041-C1DT	4490	J	6320	JF	*1.408	1390	J	1990	JF	*1.432	812	J	812	J	None	927	J	927	J	None	271	J	271	J	None
08A-0041-C1ES	323		455	F	*1.409	91.9		131	F	*1.425	66.9		66.9		None	84.6		84.6		None	22.4		22.4		None
08A-0042-C2AS	8300	J	11700	JF	*1.410	1250	J	1790	JF	*1.432	1510	J	1510	J	None	977	J	977	J	None	276	J	276	J	None
08A-0042-C2BS	567	J	798	JF	*1.407	103	J	147	JF	*1.427	116	J	116	J	None	69.9	J	69.9	J	None	23.6	J	23.6	J	None
08A-0042-C2CS	10300	J	14500	JF	*1.408	1650	J	2360	JF	*1.430	2200	J	2200	J	None	1370	J	1370	J	None	445	J	445	J	None
08A-0042-C2DS	4960		6980	F	*1.407	581		830	F	*1.429	992		992		None	556		556		None	234		234		None
08A-0042-C2ES	16500	J	23200	JF	*1.406	8060	J	11500	JF	*1.427	3310	J	3310	J	None	4650	J	4650	J	None	1010	J	1010	J	None
08A-0043-C2AS	3390	J	4770	JF	*1.407	530	J	757	JF	*1.428	983	J	983	J	None	672	J	672	J	None	195	J	195	J	None
08A-0043-C2BS	700		6940	B	Split-Replaced	103		1070	B	Split-Replaced	245		1680		Split-Replaced	104		902	B	Split-Replaced	66.3		576		Split-Replaced
08A-0043-C2CS	9180	J	19500	B	Split-Replaced	1220	J	2630	B	Split-Replaced	5490	J	5340		Split-Replaced	1960	J	2120	B	Split-Replaced	2050	J	2250		Split-Replaced
08A-0043-C2DS	4990	J	7030	JF	*1.409	585	J	836	JF	*1.429	1800	J	1800	J	None	569	J	569	J	None	601	J	601	J	None
08A-0044-C1AS	2900	J	4080	JF	*1.407	593	J	847	JF	*1.428	693	J	693	J	None	685	J	685	J	None	148	J	148	J	None
08A-0044-C1BS	4600		6480	F	*1.409	669		956	F	*1.429	1070		1070		None	592		592		None	239		239		None
08A-0044-C1CS	1040		1460	F	*1.404	112		160	F	*1.429	215		215		None	107		107		None	51.3		51.3		None
08A-0044-C1DS	89.4		126	F	*1.409	6.4	J	6.4	J	ND or <QL	32.9		32.9		None	5.74	J	5.74	J	ND or <QL	21.6		21.6		None
08A-0044-C1ES	69.8		98.3	F	*1.408	3.69	J	3.69	J	ND or <QL	18.4		18.4		None	3.41	J	3.41	J	ND or <QL	12.8	J	12.8	J	ND or <QL
08A-0045-C2AS	8900	J	12500	JF	*1.404	3000	J	4290	JF	*1.430	2030	J	2030	J	None	2340	J	2340	J	None	378	J	378	J	None
08A-0045-C2BS	38800	J	54600	JF	*1.407	14600	J	20900	JF	*1.432	5340	J	5340	J	None	9260	J	9260	J	None	1310	J	1310	J	None
08A-0045-C2CS	7300	J	10300	JF	*1.411	3210	J	4590	JF	*1.430	1650	J	1650	J	None	2730	J	2730	J	None	487	J	487	J	None
08A-0045-C2DS	9500		13400	F	*1.411	1230		1760	F	*1.431	1870		1870		None	2370		2370		None	568		568		None
08A-0045-C2ES	7710	J	10900	JF	*1.414	1130	J	1610	JF	*1.425	1450	J	1450	J	None	2340	J	2340	J	None	405		405		None
08A-0045-C2FS	2660		3750	F	*1.410	303		433	F	*1.429	257		257		None	546		546		None	87.7		87.7		None
08A-0045-C2FT	2720		3830	F	*1.408	333		476	F	*1.429	275		275		None	567		567		None	96.8		96.8		None
08A-0045-C2GS	1600		2250	F	*1.406	94.2		135	F	*1.433	69.9		69.9		None	181		181		None	27.4		27.4		None
08A-0045-C2HS	2560		3600	F	*1.406	237		339	F	*1.430	135		135		None	95.1		95.1		None	68.6		68.6		None
08A-0045-C2IS	2280		3210	F	*1.408	178		254	F	*1.427	100		100		None	82.8		82.8		None	38.5		38.5		None
08A-0046-C2AS	298		420	F	*1.409	46.7	J	46.7	J	ND or <QL	47.9		47.9		None	39.7		39.7		None	10	J	10	J	ND or <QL
08A-0047-C1AS	2870	J	4040	JF	*1.408	416	J	594	JF	*1.428	702	J	702	J	None	400	J	400	J	None	142	J	142	J	None
08A-0047-C1BS	522		735	F	*1.408	95.3		136	F	*1.427	109		109		None	107		107		None	27.6		27.6		None
08A-0047-C1CS	240		338	F	*1.408	39.7		56.7	F	*1.428	52.4		52.4		None	46.6		46.6		None	14.8		14.8		None
08A-0047-C1DS	2020		2840	F	*1.406	68.7		98.2	F	*1.429	160		160		None	49.8	J	49.8	J	None	101	J	101	J	None
08A-0047-C1ES	111		156	F	*1.405	9.34	J	9.34	J	ND or <QL	13.8		13.8		None	6.67	J	6.67	J	ND or <QL	9.04		9.04		None
08A-0047-D4AS	1740		2450	F	*1.408	217		310	F	*1.429	377		377		None	201		201		None	73.2		73.2		None
08A-0047-D4BS	1440		2030	F	*1.410	174		249	F	*1.431	290		290		None	155		155		None	60.3		60.3		None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	OCDD 3268-87-9 ng/kg					OCDF 39001-02-0 ng/kg					Total HpCDD HPCDD ng/kg					Total HpCDF HPCDF ng/kg					Total HxCDD HXCDD ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0047-D4CS	1230		1730	F	*1.407	106		151	F	*1.425	313		313		None	132		132		None	51.7		51.7		None
08A-0047-D4DS	391		551	F	*1.409	47.5		67.9	F	*1.429	85.4		85.4		None	56		56		None	26.5		26.5		None
08A-0047-D4ES	1340		1890	F	*1.410	135		193	F	*1.430	247		247		None	115		115		None	52.6		52.6		None
08A-0048-C2AS	636	J	895	JF	*1.407	127	J	181	JF	*1.425	111	J	111	J	None	98.7	J	98.7	J	None	24.2	J	24.2	J	None
08A-0048-C2BS	471		663	F	*1.408	25.9		37	F	*1.429	101		101		None	18.2		18.2		None	72.8		72.8		None
08A-0048-C2CS	656	J	924	JF	*1.409	9.35	J	9.35	J	ND or <QL	62.7	J	62.7	J	None	11.5	J	11.5	J	None	27.1	J	27.1	J	None
08A-0048-C2DS	5.61	J	5.61	J	ND or <QL	< 0.229	U	< 0.229	U	ND or <QL	< 0.650	U	< 0.650	U	ND or <QL	< 0.187	U	< 0.187	U	ND or <QL	< 0.152	U	< 0.152	U	ND or <QL
08A-0048-C2ES	143	J	201	JF	*1.406	< 0.267	U	< 0.267	U	ND or <QL	17.1		17.1		None	< 0.149	U	< 0.149	U	ND or <QL	3.8	J	3.8	J	ND or <QL
08A-0049-C1AS	240		338	F	*1.408	23.8	J	23.8	J	ND or <QL	56.9		56.9		None	32.5		32.5		None	10.9	J	10.9	J	ND or <QL
08A-0049-C1BS	703		990	F	*1.408	89.5		128	F	*1.430	124		124		None	126		126		None	22.1		22.1		None
08A-0049-C1CS	475		669	F	*1.408	123		176	F	*1.431	99.8		99.8		None	132		132		None	25.1		25.1		None
08A-0049-C1DS	1550	J	2180	JF	*1.406	205		293	F	*1.429	388		388		None	153		153		None	43.8		43.8		None
08A-0049-C2ES	729		1030	F	*1.413	93.7		134	F	*1.430	140		140		None	87.4		87.4		None	29.6		29.6		None
08A-0050-C1AS	1050	J	1480	JF	*1.410	108	J	154	JF	*1.426	244	J	244	J	None	112	J	112	J	None	41.1	J	41.1	J	ND or <QL
08A-0050-C1BS	1880		3320	B	Split-Replaced	321		428	B	Split-Replaced	406		627		Split-Replaced	259		463	B	Split-Replaced	89.2		192		Split-Replaced
08A-0050-C1CS	2110	J	3060	B	Split-Replaced	488	J	575	B	Split-Replaced	476		676		Split-Replaced	450		610	B	Split-Replaced	173		248		Split-Replaced
08A-0050-C1DS	< 43.9	UJ	< 43.9	UJ	ND or <QL	< 2.26	UJ	< 2.26	UJ	ND or <QL	< 7.56	U	< 7.56	U	ND or <QL	< 1.29	U	< 1.29	U	ND or <QL	1.1	J	1.1	J	ND or <QL
08A-0051-C1AS	749		1050	F	*1.402	85.3		122	F	*1.430	137		137		None	93		93		None	27		27		None
08A-0051-C1BS	1110		108	B	Split-Replaced	49.9		10.2	BJ	Split-Replaced	205		24.1		Split-Replaced	51.5		11.7	B	Split-Replaced	12.6	J	5.64	J	Split-Replaced
08A-0051-C2CS	202		317	B	Split-Replaced	26.9	J	50.3	B	Split-Replaced	42.2		104		Split-Replaced	23		56	B	Split-Replaced	11.1	J	7.31	J	Split-Replaced
08A-0052-C2AS	576		811	F	*1.408	72.4		103	F	*1.423	104		104		None	58.2		58.2		None	18.7		18.7		None
08A-0054-C3AS	< 43.3	U	< 43.3	U	ND or <QL	< 4.99	U	< 4.99	U	ND or <QL	< 9.08	U	< 9.08	U	ND or <QL	< 3.72	U	< 3.72	U	ND or <QL	1.03	J	1.03	J	ND or <QL
08A-0054-C3BS	< 16	UJ	< 16	UJ	ND or <QL	< 2.84	UJ	< 2.84	UJ	ND or <QL	< 3.49	U	< 3.49	U	ND or <QL	< 0.997	U	< 0.997	U	ND or <QL	< 0.135	U	< 0.135	U	ND or <QL
08A-0054-C3CS	< 17	U	< 17	U	ND or <QL	< 2.92	U	< 2.92	U	ND or <QL	< 5.16	U	< 5.16	U	ND or <QL	< 1.48	U	< 1.48	U	ND or <QL	< 0.353	U	< 0.353	U	ND or <QL
08A-0055-C2AS	4800	J	6760	JF	*1.408	728	J	1040	JF	*1.429	1170	J	1170	J	None	737	J	737	J	None	223	J	223	J	None
08A-0055-C2BS	3930		5530	F	*1.407	805		1150	F	*1.429	845		845		None	653		653		None	188		188		None
08A-0055-C2CS	153		215	F	*1.405	< 0.397	U	< 0.397	U	ND or <QL	13.3	J	13.3	J	ND or <QL	< 0.254	U	< 0.254	U	ND or <QL	2.42	J	2.42	J	ND or <QL
08A-0055-C2DS	< 17	U	< 17	U	ND or <QL	< 0.369	U	< 0.369	U	ND or <QL	< 2.61	U	< 2.61	U	ND or <QL	< 0.373	U	< 0.373	U	ND or <QL	< 0.191	U	< 0.191	U	ND or <QL
08A-0055-C2ES	33.5	J	33.5	J	ND or <QL	< 0.396	U	< 0.396	U	ND or <QL	< 5	U	< 5	U	ND or <QL	< 0.170	U	< 0.170	U	ND or <QL	0.751	J	0.751	J	ND or <QL
08A-0055-C2FS	< 18	U	< 18	U	ND or <QL	< 2.66	U	< 2.66	U	ND or <QL	< 3.96	U	< 3.96	U	ND or <QL	< 1.37	U	< 1.37	U	ND or <QL	< 0.305	U	< 0.305	U	ND or <QL
08A-0056-C2AS	3260	J	4590	JF	*1.408	339	J	484	JF	*1.428	785	J	785	J	None	276	J	276	J	None	147	J	147	J	None
08A-0056-C2BS	1040		1460	F	*1.404	107		153	F	*1.430	200		200		None	97.1		97.1		None	42.7		42.7		None
08A-0056-C2CS	1820		2560	F	*1.407	308		440	F	*1.429	308		308		None	185		185		None	61.5		61.5		None
08A-0056-C2DS	9130		12900	F	*1.413	1180		1690	F	*1.432	1460		1460		None	874		874		None	307		307		None
08A-0056-C2ES	17200	J	24200	JF	*1.407	2450	J	3500	JF	*1.429	2810	J	2810	J	None	1790	J	1790	J	None	617	J	617	J	None
08A-0056-C2FS	103000	J	145000	JF	*1.408	7560	J	10800	JF	*1.429	5740	J	5740	J	None	4500	J	4500	J	None	1280	J	1280	J	None
08A-0056-C2GS	24400	J	34400	JF	*1.410	8280	J	11800	JF	*1.425	4450	J	4450	J	None	4560	J	4560	J	None	1070	J	1070	J	None
08A-0056-C2HS	8870	J	12500	JF	*1.409	3410	J	4870	JF	*1.428	1480		1480		None	1530		1530		None	365		365		None
08A-0056-C2IS	615		866	F	*1.408	236		337	F	*1.428	99.7		99.7		None	80.4		80.4		None	26.3		26.3		None
08A-0057-C1AS	2420	J	3410	JF	*1.409	306	J	437	JF	*1.428	591	J	591	J	None	293	J	293	J	None	100	J	100	J	None
08A-0057-C1BS	5490	J	7730	JF	*1.408	3120	J	4460	JF	*1.429	1570	J	1570	J	None	2220	J	2220	J	None	370	J	370	J	None
08A-0057-C1CS	3370	J	4740	JF	*1.407	5340	J	7630	JF	*1.429	650	J	650	J	None	2480	J	2480	J	None	193	J	193	J	None
08A-0057-C1DS	3840		5410	F	*1.409	2720		3890	F	*1.430	635		635		None	570		570		None	149		149		None
08A-0057-C1ES	2650		3730	F	*1.408	538		769	F	*1.429	429		429		None	537		537		None	141		141		None
08A-0057-C1FS	90.7	J	128	JF	*1.411	27.5	J	27.5	J	ND or <QL	15.5	J	15.5	J	ND or <QL	15.5	J	15.5	J	ND or <QL	6.06	J	6.06	J	ND or <QL
08A-0057-C1FT	424	J	597	JF	*1.408	26.9	J	26.9	J	ND or <QL	30.6		30.6		None	16.6	J	16.6	J	ND or <QL	7.54	J	7.54	J	ND or <QL
08A-0057-C1GS	452		636	F	*1.407	3.98	J	3.98	J	ND or <QL	30.5		30.5		None	3.27	J	3.27	J	ND or <QL	4.7	J	4.7	J	ND or <QL
08A-0058-C1AS	2490	J	3510	JF	*1.410	260	J	260	J	ND or <QL	655	J	655	J	None	291	J	291	J	None	143	J	143	J	ND or <QL
08A-0058-C1BS	454	J	639	JF	*1.407	61.6	J	88	JF	*1.429	125	J	125	J	None	66.4	J	66.4	J	None	22	J	22	J	ND or <QL
08A-0058-C1CS	1490	J	2100	JF	*1.409	182	J	260	JF	*1.429	388	J	388	J	None	190	J	190	J	None	86	J	86	J	None
08A-0058-C1CT	454	J	639	JF	*1.407	246	J	352	JF	*1.431	115	J	115	J	None	230	J	230	J	None	20.4	J	20.4	J	ND or <QL
08A-0058-C1DS	464		653	F	*1.407	215		307	F	*1.428	133		133		None	168		168		None	40.5		40.5		None
08A-0058-C1ES	155		218	F	*1.406	16.2	J	16.2	J	ND or <QL	28.3		28.3		None	26.5		26.5		None	5.69	J	5.69	J	ND or <QL

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	OCDD 3268-87-9 ng/kg					OCDF 39001-02-0 ng/kg					Total HpCDD HPCDD ng/kg					Total HpCDF HPCDF ng/kg					Total HxCDD HXCDD ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0058-C1FS	83.1		117	F	*1.408	5.05	J	5.05	J	ND or <QL	14.3	J	14.3	J	ND or <QL	< 4.45	U	< 4.45	U	ND or <QL	5.69	J	5.69	J	ND or <QL
08A-0060-C1AS	6160	J	8670	JF	*1.407	544	J	777	JF	*1.428	1410	J	1410	J	None	559	J	559	J	None	222	J	222	J	None
08A-0060-C1BS	1290	J	1820	JF	*1.411	244	J	349	JF	*1.430	390	J	390	J	None	234	J	234	J	None	68.3	J	68.3	J	None
08A-0060-C1CS	9490	J	13400	JF	*1.412	1560	J	2230	JF	*1.429	2210	J	2210	J	None	1430	J	1430	J	None	389	J	389	J	None
08A-0060-C1DS	6570	J	9250	JF	*1.408	1570	J	2240	JF	*1.427	1520	J	1520	J	None	1320	J	1320	J	None	277	J	277	J	None
08A-0060-C1ES	1610		2270	F	*1.410	249		356	F	*1.430	326		326		None	231		231		None	59.5		59.5		None
08A-0060-C1FS	47.1	J	47.1	J	ND or <QL	< 0.493	U	< 0.493	U	ND or <QL	< 9.43	U	< 9.43	U	ND or <QL	< 0.682	U	< 0.682	U	ND or <QL	< 0.241	U	< 0.241	U	ND or <QL
08A-0060-C1GS	49.5		69.7	F	*1.408	17.2	J	17.2	J	ND or <QL	< 12.0	U	< 12.0	U	ND or <QL	19.4	J	19.4	J	ND or <QL	< 0.111	U	< 0.111	U	ND or <QL
08A-0061-C1AS	791	J	1110	JF	*1.403	57.7	J	57.7	J	ND or <QL	162		162		None	70		70		None	30.7		30.7		None
08A-0061-C1BS	173	J	244	JF	*1.410	17.9	J	17.9	J	ND or <QL	27.6		27.6		None	20.5		20.5		None	8.08	J	8.08	J	ND or <QL
08A-0061-C1CS	185	J	260	JF	*1.405	19.3	J	19.3	J	ND or <QL	34		34		None	19.3		19.3		None	2.38	J	2.38	J	ND or <QL
08A-0061-C1DS	569	J	801	JF	*1.408	16.7	J	16.7	J	ND or <QL	32.8		32.8		None	16.8	J	16.8	J	ND or <QL	7.64	J	7.64	J	ND or <QL
08A-0061-C1ES	< 15.7	UJ	< 15.7	UJ	ND or <QL	< 0.768	UJ	< 0.768	UJ	ND or <QL	< 1.36	U	< 1.36	U	ND or <QL	< 0.266	U	< 0.266	U	ND or <QL	< 0.208	U	< 0.208	U	ND or <QL
08A-0062-C1AS	1980	J	2790	JF	*1.409	264	J	377	JF	*1.428	407	J	407	J	None	555	J	555	J	None	128	J	128	J	None
08A-0062-C1BS	12500	J	17600	JF	*1.408	1280	J	1830	JF	*1.430	2130	J	2130	J	None	2840	J	2840	J	None	521	J	521	J	None
08A-0062-C1CS	15400	J	21700	JF	*1.409	2580	J	3690	JF	*1.430	2960	J	2960	J	None	7200	J	7200	J	None	834	J	834	J	None
08A-0062-C1DS	969		1360	F	*1.404	120		171	F	*1.425	171		171		None	224		224		None	48.5		48.5		None
08A-0062-C1ES	2130		4340	B	Split-Replaced	244		480	B	Split-Replaced	184		339		Split-Replaced	488		824	B	Split-Replaced	62.1		117		Split-Replaced
08A-0062-C1FS	2270		1990	B	Split-Replaced	123		113	B	Split-Replaced	124		100		Split-Replaced	185		159	B	Split-Replaced	60.7		48.5		Split-Replaced
08A-0062-C1GS	112		350	B	Split-Replaced	< 3.43	U	9.44	BJ	Split-Replaced	< 6.82	U	19.1		Split-Replaced	4.46	J	10.5	B	Split-Replaced	2.48	J	2.34	J	Split-Replaced
08A-0062-C1HS	104		146	F	*1.404	< 2.15	U	< 2.15	U	ND or <QL	< 5.49	U	< 5.49	U	ND or <QL	1.99	J	1.99	J	ND or <QL	1.78	J	1.78	J	ND or <QL
08A-0062-D1AS	1210	J	1700	JF	*1.405	174	J	249	JF	*1.431	294	J	294	J	None	146	J	146	J	None	49.4	J	49.4	J	ND or <QL
08A-0062-D1BS	2040	J	2870	JF	*1.407	302	J	432	JF	*1.430	451	J	451	J	None	237	J	237	J	None	78.9	J	78.9	J	None
08A-0062-D1CS	6370	J	8970	JF	*1.408	948	J	1350	JF	*1.424	1440	J	1440	J	None	709	J	709	J	None	234	J	234	J	None
08A-0062-D1DS	3370	J	4740	JF	*1.407	401	J	573	JF	*1.429	587	J	587	J	None	654	J	654	J	None	118	J	118	J	None
08A-0062-D1ES	15200	J	21400	JF	*1.408	2530	J	3620	JF	*1.431	2700	J	2700	J	None	5430	J	5430	J	None	691	J	691	J	None
08A-0062-D1ET	17400	J	24500	JF	*1.408	2130	J	3040	JF	*1.427	2620	J	2620	J	None	4980	J	4980	J	None	672	J	672	J	None
08A-0063-C1AS	5930	J	8350	JF	*1.408	855	J	1220	JF	*1.427	1330	J	1330	J	None	813	J	813	J	None	222	J	222	J	None
08A-0063-C1BS	10600	J	14900	JF	*1.406	2220	J	3170	JF	*1.428	1940	J	1940	J	None	1920	J	1920	J	None	398	J	398	J	None
08A-0063-C1CS	6420	J	9040	JF	*1.408	1450	J	2070	JF	*1.428	1290	J	1290	J	None	1360	J	1360	J	None	267	J	267	J	None
08A-0063-C1DS	284		400	F	*1.408	35.8	J	35.8	J	ND or <QL	60.7		60.7		None	35.1		35.1		None	17.6	J	17.6	J	ND or <QL
08A-0064-C1AS	9050	J	12700	JF	*1.403	707	J	1010	JF	*1.429	798	J	798	J	None	435	J	435	J	None	108	J	108	J	None
08A-0064-C1BS	288		406	F	*1.410	21.9	J	21.9	J	ND or <QL	26.5		26.5		None	14.6		14.6		None	3.47	J	3.47	J	ND or <QL
08A-0064-C1BT	368		518	F	*1.408	35.2	J	35.2	J	ND or <QL	37.1		37.1		None	23.9		23.9		None	5.26	J	5.26	J	ND or <QL
08A-0064-C1CS	< 23.7	U	< 23.7	U	ND or <QL	< 3.67	U	< 3.67	U	ND or <QL	< 6.22	U	< 6.22	U	ND or <QL	< 1.79	U	< 1.79	U	ND or <QL	< 0.149	U	< 0.149	U	ND or <QL
08A-0065-C3AS	3050	J	4290	JF	*1.407	475	J	679	JF	*1.429	556	J	556	J	None	340	J	340	J	None	107	J	107	J	None
08A-0065-C3BS	7540		10600	F	*1.406	838		1200	F	*1.432	1100		1100		None	797		797		None	231		231		None
08A-0065-C3CS	72.1		102	F	*1.415	< 2.03	U	< 2.03	U	ND or <QL	10	J	10	J	ND or <QL	< 1.84	U	< 1.84	U	ND or <QL	0.588	J	0.588	J	ND or <QL
08A-0065-C3DS	< 19.7	U	< 19.7	U	ND or <QL	< 0.873	U	< 0.873	U	ND or <QL	< 3.08	U	< 3.08	U	ND or <QL	< 0.239	U	< 0.239	U	ND or <QL	0.791	J	0.791	J	ND or <QL
08A-0065-C3ES	< 21.3	U	< 21.3	U	ND or <QL	< 0.914	UJ	< 0.914	UJ	ND or <QL	< 1.69	U	< 1.69	U	ND or <QL	< 0.309	U	< 0.309	U	ND or <QL	< 0.167	U	< 0.167	U	ND or <QL
08A-0065-C3ET	< 21.4	U	< 21.4	U	ND or <QL	< 4.19	U	< 4.19	U	ND or <QL	< 4.17	U	< 4.17	U	ND or <QL	< 1.61	U	< 1.61	U	ND or <QL	< 0.204	U	< 0.204	U	ND or <QL
08A-0065-C3FS	< 66.2	U	< 66.2	U	ND or <QL	< 1.38	U	< 1.38	U	ND or <QL	< 7.31	U	< 7.31	U	ND or <QL	< 0.296	U	< 0.296	U	ND or <QL	1.44	J	1.44	J	ND or <QL
08A-0065-C3GS	< 22.5	U	< 22.5	U	ND or <QL	< 1.46	U	< 1.46	U	ND or <QL	< 4.25	U	< 4.25	U	ND or <QL	< 0.578	U	< 0.578	U	ND or <QL	< 0.107	U	< 0.107	U	ND or <QL
08A-0065-C3HS	< 24.8	U	< 24.8	U	ND or <QL	< 1.42	U	< 1.42	U	ND or <QL	< 4.92	U	< 4.92	U	ND or <QL	< 1.48	U	< 1.48	U	ND or <QL	< 0.348	U	< 0.348	U	ND or <QL
08A-0065-C3IS	< 37.0	U	< 37.0	U	ND or <QL	< 0.810	U	< 0.810	U	ND or <QL	< 4.21	U	< 4.21	U	ND or <QL	< 0.895	U	< 0.895	U	ND or <QL	0.609	J	0.609	J	ND or <QL
08A-0066-C1AS	234		329	F	*1.406	16.9	J	16.9	J	ND or <QL	44		44		None	19.9		19.9		None	20.3		20.3		None
08A-0066-C1AT	209		294	F	*1.407	21.9	J	21.9	J	ND or <QL	40		40		None	20.3		20.3		None	9.75	J	9.75	J	ND or <QL
08A-0066-C1BS	263		370	F	*1.407	34.2	J	34.2	J	ND or <QL	50.6		50.6		None	54.4		54.4		None	9.24	J	9.24	J	ND or <QL
08A-0066-C1CS	274		386	F	*1.409	19.9	J	19.9	J	ND or <QL	49.9		49.9		None	22.4		22.4		None	21.3		21.3		None
08A-0066-C1DS	202		284	F	*1.406	< 13.1	U	< 13.1	U	ND or <QL	< 33.5	U	< 33.5	U	ND or <QL	14.2	J	14.2	J	ND or <QL	4.36	J	4.36	J	ND or <QL
08A-0066-C1ES	< 19.8	U	< 19.8	U	ND or <QL	< 1.5	U	< 1.5	U	ND or <QL	< 1.62	U	< 1.62	U	ND or <QL	< 1.1	U	< 1.1	U	ND or <QL	< 0.0663	U	< 0.0663	U	ND or <QL
08A-0067-C2AS	7250	J	10200	JF	*1.407	2080	J	2970	JF	*1.428	1480	J	1480	J	None	1360	J	1360	J	None	351	J	351	J	None
08A-0067-C2BS	45400	J	63900	JF	*1.407	11000	J	15700	JF	*1.427	7450	J	7450	J	None	8130	J	8130	J	None	1610	J	1610	J	None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	OCDD 3268-87-9 ng/kg					OCDF 39001-02-0 ng/kg					Total HpCDD HPCDD ng/kg					Total HpCDF HPCDF ng/kg					Total HxCDD HXCDD ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0067-C2CS	3730		5250	F	*1.408	778		1110	F	*1.427	802		802		None	722		722		None	197		197		None
08A-0067-C2DS	49.4		69.6	F	*1.409	8.77	J	8.77	J	ND or <QL	5.84	J	5.84	J	ND or <QL	4.52	J	4.52	J	ND or <QL	< 0.180	U	< 0.180	U	ND or <QL
08A-0067-C2ES	110		151	B	Split-Replaced	< 0.256	U	< 1.33	U	Split-Replaced	11.1	J	13.1		Split-Replaced	< 0.230	U	< 0.187	U	Split-Replaced	1.5	J	1.93	J	Split-Replaced
08A-0067-C2FS	< 14.0	U	< 14.0	U	ND or <QL	0.996	J	0.996	J	ND or <QL	< 3.07	U	< 3.07	U	ND or <QL	< 0.594	U	< 0.594	U	ND or <QL	< 0.117	U	< 0.117	U	ND or <QL
08A-0068-C1AS	6860	J	9660	JF	*1.408	1210	J	1730	JF	*1.430	1250	J	1250	J	None	793	J	793	J	None	232	J	232	J	None
08A-0068-C1BS	7730	J	10900	JF	*1.410	1170	J	1670	JF	*1.427	1340	J	1340	J	None	947	J	947	J	None	267	J	267	J	None
08A-0068-C1CS	3400	J	4790	JF	*1.409	595	J	850	JF	*1.429	678		678		None	527		527		None	170		170		None
08A-0068-C1DS	1700	J	2390	JF	*1.406	213	J	304	JF	*1.427	241		241		None	276		276		None	56.7		56.7		None
08A-0068-C1ES	158	J	222	JF	*1.405	18.9	J	18.9	J	ND or <QL	< 14.1	U	< 14.1	U	ND or <QL	10	J	10	J	ND or <QL	3.16	J	3.16	J	ND or <QL
08A-0068-C1ET	245	J	345	JF	*1.408	69.5	J	99.3	JF	*1.429	17.8		17.8		None	17.6		17.6		None	1.15	J	1.15	J	ND or <QL
08A-0069-C1AS	5440	J	7660	JF	*1.408	870	J	1240	JF	*1.425	1030	J	1030	J	None	743	J	743	J	None	216	J	216	J	None
08A-0069-C1BS	14500	J	20400	JF	*1.407	3610	J	5160	JF	*1.429	2830	J	2830	J	None	3150	J	3150	J	None	776	J	776	J	None
08A-0069-C1CS	10500	J	14800	JF	*1.410	1390	J	1990	JF	*1.432	2030	J	2030	J	None	2260	J	2260	J	None	493	J	493	J	None
08A-0069-C1DS	3420		4820	F	*1.409	452		646	F	*1.429	255		255		None	821		821		None	77.1		77.1		None
08A-0069-C1ES	228	J	321	JF	*1.408	13.4	J	13.4	J	ND or <QL	< 10.1	U	< 10.1	U	ND or <QL	24.6		24.6		None	2.41	J	2.41	J	ND or <QL
08A-0070-C3CS	1200		1690	F	*1.408	75.2		107	F	*1.423	203		203		None	72.9		72.9		None	28		28		None
08A-0070-C3DS	901		1270	F	*1.410	40.4		57.7	F	*1.428	148		148		None	43		43		None	32.2		32.2		None
08A-0070-C3ES	2150		3030	F	*1.409	257		367	F	*1.428	266		266		None	275		275		None	66.7		66.7		None
08A-0071-C1AS	268		377	F	*1.407	25.8	J	25.8	J	ND or <QL	80.1		80.1		None	49.8		49.8		None	9.01	J	9.01	J	ND or <QL
08A-0071-C1BS	191		269	F	*1.408	15.7	J	15.7	J	ND or <QL	63.2		63.2		None	18.1		18.1		None	9.31	J	9.31	J	ND or <QL
08A-0071-C1CS	252		355	F	*1.409	22.6	J	22.6	J	ND or <QL	15.4	J	15.4	J	ND or <QL	14.1	J	14.1	J	ND or <QL	2.03	J	2.03	J	ND or <QL
08A-0072-C6AS	659		928	F	*1.408	44.3		63.3	F	*1.429	132		132		None	67.2		67.2		None	24.2		24.2		None
08A-0073-C4AS	2600	J	3660	JF	*1.408	381	J	544	JF	*1.428	486	J	486	J	None	432	J	432	J	None	58.5	J	58.5	J	ND or <QL
08A-0073-C4BS	12000	J	16900	JF	*1.408	1740	J	2490	JF	*1.431	2380	J	2380	J	None	1660	J	1660	J	None	446	J	446	J	None
08A-0073-C4CS	1870		2630	F	*1.406	179		256	F	*1.430	265		265		None	195		195		None	61.5		61.5		None
08A-0074-C2AS	2960	J	4170	JF	*1.409	291	J	416	JF	*1.430	670	J	670	J	None	310	J	310	J	None	115	J	115	J	None
08A-0074-C2BS	1980	J	2790	JF	*1.409	233	J	333	JF	*1.429	469	J	469	J	None	245	J	245	J	None	86.9	J	86.9	J	None
08A-0074-C2CS	1910	J	2690	JF	*1.408	311	J	444	JF	*1.428	455	J	455	J	None	320	J	320	J	None	83	J	83	J	None
08A-0074-C2DS	653		919	F	*1.407	68.1		97.3	F	*1.429	190		190		None	75		75		None	30.3		30.3		None
08A-0074-C2ES	8010		11300	F	*1.411	895		1280	F	*1.430	1550		1550		None	740		740		None	235		235		None
08A-0074-C2FS	2060	J	2900	JF	*1.408	187	J	267	JF	*1.428	370	J	370	J	None	151	J	151	J	None	77.5	J	77.5	J	None
08A-0074-C2GS	10700		15100	F	*1.411	1360		1940	F	*1.426	1970		1970		None	1220		1220		None	362		362		None
08A-0075-C1AS	463		652	F	*1.408	41.3		59	F	*1.429	111		111		None	51.5		51.5		None	21.1		21.1		None
08A-0075-C1BS	661		931	F	*1.408	71.6		102	F	*1.425	144		144		None	68.6		68.6		None	29.5		29.5		None
08A-0076-C5AS	6810	J	9590	JF	*1.408	609	J	870	JF	*1.429	1490	J	1490	J	None	666	J	666	J	None	229	J	229	J	None
08A-0076-C5BS	331	J	466	JF	*1.408	21.4	J	21.4	J	ND or <QL	60.6		60.6		None	22.1		22.1		None	11.5	J	11.5	J	ND or <QL
08A-0076-C5CS	< 125	U	< 125	U	ND or <QL	< 5.37	U	< 5.37	U	ND or <QL	< 21.6	U	< 21.6	U	ND or <QL	< 6.02	U	< 6.02	U	ND or <QL	3.06	J	3.06	J	ND or <QL
08A-0077-C2AS	5570	J	7840	JF	*1.408	872	J	1250	JF	*1.433	1010	J	1010	J	None	650	J	650	J	None	172	J	172	J	None
08A-0077-C2BS	10500	J	14800	JF	*1.410	1280	J	1830	JF	*1.430	1550		1550		None	945		945		None	266		266		None
08A-0077-C2CS	22800		32100	F	*1.408	4930		7040	F	*1.428	3700		3700		None	3110		3110		None	733		733		None
08A-0077-C2DS	< 30.1	UJ	< 30.1	UJ	ND or <QL	< 3.51	UJ	< 3.51	UJ	ND or <QL	< 3.19	U	< 3.19	U	ND or <QL	< 1.32	U	< 1.32	U	ND or <QL	< 0.281	U	< 0.281	U	ND or <QL
08A-0078-C1AS	1380		1940	F	*1.406	104		149	F	*1.433	229		229		None	85.9		85.9		None	42.4		42.4		None
08A-0078-C1BS	1900		2680	F	*1.411	182		260	F	*1.429	286		286		None	138		138		None	50.1		50.1		None
08A-0078-C1CS	4350		6120	F	*1.407	343		490	F	*1.429	575		575		None	231		231		None	87.5		87.5		None
08A-0078-C1DS	10800		15200	F	*1.407	942		1350	F	*1.433	1840		1840		None	657		657		None	444		444		None
08A-0078-C1ES	9780		13800	F	*1.411	561		802	F	*1.430	1350		1350		None	441		441		None	170		170		None
08A-0078-C1FS	3840		5410	F	*1.409	385		550	F	*1.429	623		623		None	348		348		None	128		128		None
08A-0078-C1GS	14200		20000	F	*1.408	2080		2970	F	*1.428	2450		2450		None	1140		1140		None	368		368		None
08A-0078-D4AS	1030		1450	F	*1.408	105		150	F	*1.429	236		236		None	91		91		None	39.8		39.8		None
08A-0078-D4BS	1760		2480	F	*1.409	213		304	F	*1.427	258		258		None	145		145		None	28.4		28.4		None
08A-0078-D4CS	454		639	F	*1.407	22.1	J	22.1	J	ND or <QL	91.5		91.5		None	24.4		24.4		None	15.9	J	15.9	J	ND or <QL
08A-0078-D4DS	1240		1750	F	*1.411	80.5		115	F	*1.429	217		217		None	71.6		71.6		None	28.1		28.1		None
08A-0078-D4ES	5820		8190	F	*1.407	391		559	F	*1.430	1040		1040		None	319		319		None	139		139		None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	OCDD 3268-87-9 ng/kg					OCDF 39001-02-0 ng/kg					Total HpCDD HPCDD ng/kg					Total HpCDF HPCDF ng/kg					Total HxCDD HXCDD ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0079-C4AS	712		1000	F	*1.404	42.8	J	42.8	J	ND or <QL	147		147		None	51		51		None	29.4		29.4		None
08A-0079-C4BS	1070		1510	F	*1.411	55.1		78.7	F	*1.428	236		236		None	57.4		57.4		None	33.8		33.8		None
08A-0079-C4CS	2060		2900	F	*1.408	293		419	F	*1.430	425		425		None	239		239		None	57.1		57.1		None
08A-0079-C4DS	1570		2210	F	*1.408	129		184	F	*1.426	276		276		None	119		119		None	47.4		47.4		None
08A-0079-C4ES	1240		1750	F	*1.411	92.9		133	F	*1.432	243		243		None	78.8		78.8		None	43.5		43.5		None
08A-0080-C1AS	1170		1650	F	*1.410	85.1		122	F	*1.434	209		209		None	72.4		72.4		None	47.6		47.6		None
08A-0080-C1BS	802		1130	F	*1.409	64.2		91.7	F	*1.428	144		144		None	56.2		56.2		None	29.8		29.8		None
08A-0080-C1CS	637		897	F	*1.408	54.5		77.9	F	*1.429	118		118		None	47.1		47.1		None	20.3		20.3		None
08A-0080-C1DS	3080		4340	F	*1.409	246		352	F	*1.431	535		535		None	307		307		None	99.2		99.2		None
08A-0080-C1ES	879	J	1240	JF	*1.411	81.3		116	F	*1.427	179		179		None	83.7		83.7		None	37.5		37.5		None
08A-0081-C2AS	874		1230	F	*1.407	65.8		94	F	*1.429	178		178		None	64.9		64.9		None	29.5		29.5		None
08A-0081-C2BS	< 84.6	U	< 84.6	U	ND or <QL	< 4.91	U	< 4.91	U	ND or <QL	< 18.8	U	< 18.8	U	ND or <QL	< 7.58	U	< 7.58	U	ND or <QL	6.04	J	6.04	J	ND or <QL
08A-0081-C2CS	246		346	F	*1.407	< 16.2	U	< 16.2	U	ND or <QL	48.3		48.3		None	26.4		26.4		None	11	J	11	J	ND or <QL
08A-0081-C2DS	742		1040	F	*1.402	50.3		71.9	F	*1.429	88.5		88.5		None	35.5		35.5		None	14.8		14.8		None
08A-0082-C2AS	1540		2170	F	*1.409	122		174	F	*1.426	356		356		None	115		115		None	53.4		53.4		None
08A-0082-C2BS	3440		4840	F	*1.407	254		363	F	*1.429	774		774		None	216		216		None	92.8		92.8		None
08A-0082-C2CS	5330		7500	F	*1.407	310		443	F	*1.429	980		980		None	244		244		None	123		123		None
08A-0082-C2DS	2260		3180	F	*1.407	132		189	F	*1.432	405		405		None	106		106		None	62.1		62.1		None
08A-0082-C2ES	7910		11100	F	*1.403	373		533	F	*1.429	1650		1650		None	289		289		None	192		192		None
08A-0082-C2FS	9910		14000	F	*1.413	402		574	F	*1.428	1600		1600		None	346		346		None	205		205		None
08A-0082-C2FT	12400		17500	F	*1.411	508		726	F	*1.429	1850		1850		None	432		432		None	226		226		None
08A-0082-C2GS	10200		14400	F	*1.412	444		634	F	*1.428	1590		1590		None	422		422		None	199		199		None
08A-0082-C2HS	25300	J	35600	JF	*1.407	885		1260	F	*1.424	3840		3840		None	829		829		None	440		440		None
08A-0082-C2IS	23500	J	33100	JF	*1.409	866		1240	F	*1.432	3170		3170		None	728		728		None	398		398		None
08A-0082-C2JS	10000		14100	F	*1.410	601		859	F	*1.429	1510		1510		None	538		538		None	235		235		None
08A-0082-C2KS	6240		8790	F	*1.409	290		414	F	*1.428	839		839		None	231		231		None	107		107		None
08A-0083-C2AS	370		521	F	*1.408	29.1	J	29.1	J	ND or <QL	74.9		74.9		None	29		29		None	12.4	J	12.4	J	ND or <QL
08A-0083-C2BS	450		634	F	*1.409	50.3		71.9	F	*1.429	132		132		None	46.4		46.4		None	16.5	J	16.5	J	ND or <QL
08A-0083-C2CS	215		303	F	*1.409	21.4	J	21.4	J	ND or <QL	55.5		55.5		None	20.7		20.7		None	10.3	J	10.3	J	ND or <QL
08A-0083-C2DS	334		470	F	*1.407	< 19.1	U	< 19.1	U	ND or <QL	89.8		89.8		None	29.7		29.7		None	30.3		30.3		None
08A-0083-C2ES	231		325	F	*1.407	< 17.1	U	< 17.1	U	ND or <QL	46		46		None	20.7		20.7		None	13.2	J	13.2	J	ND or <QL
08A-0084-C1AS	456		642	F	*1.408	66.1		94.5	F	*1.430	91		91		None	39.2		39.2		None	12.9	J	12.9	J	ND or <QL
08A-0084-C1BS	138	J	194	JF	*1.406	22	J	22	J	ND or <QL	34.6		34.6		None	15.6	J	15.6	J	ND or <QL	5.32	J	5.32	J	ND or <QL
08A-0084-C1BT	283	J	398	JF	*1.406	59	J	84.3	JF	*1.429	67.6		67.6		None	39.5		39.5		None	5.89	J	5.89	J	ND or <QL
08A-0084-C1CS	12600	J	17700	JF	*1.405	1060	J	1510	JF	*1.425	2580	J	2580	J	None	817	J	817	J	None	322	J	322	J	None
08A-0084-C1DS	8860		12500	F	*1.411	511		730	F	*1.429	1600		1600		None	452		452		None	253		253		None
08A-0084-C1ES	15000		15600	BD	Split-Replaced	767		710	BD	Split-Replaced	2970		2740	D	Split-Replaced	674		754	BD	Split-Replaced	322		358	BD	Split-Replaced
08A-0084-C1FS	17800		17100	B	Split-Replaced	804		1020	B	Split-Replaced	2960		3100	B	Split-Replaced	706		1140	B	Split-Replaced	344		423	B	Split-Replaced
08A-0084-C1GS	2950		4150	F	*1.407	250		357	F	*1.428	580		580		None	234		234		None	106		106		None
08A-0085-C1AS	643		905	F	*1.407	38.6	J	38.6	J	ND or <QL	135		135		None	42.1		42.1		None	24.5		24.5		None
08A-0085-C1BS	871		1230	F	*1.412	49.1	J	49.1	J	ND or <QL	161		161		None	47.6		47.6		None	22.6	J	22.6	J	ND or <QL
08A-0085-C1CS	4640		6530	F	*1.407	331		473	F	*1.429	929		929		None	320		320		None	273		273		None
08A-0085-C1DS	1710		2410	F	*1.409	122		174	F	*1.426	362		362		None	200		200		None	67.2		67.2		None
08A-0085-C1ES	7520		10600	F	*1.410	510		729	F	*1.429	1540		1540		None	886		886		None	303		303		None
08A-0085-C1FS	1410		1990	F	*1.411	127	J	181	JF	*1.425	340		340		None	298	J	298	J	None	86.4		86.4		None
08A-0085-C1FT	1380		1940	F	*1.406	214	J	306	JF	*1.430	365		365		None	619	J	619	J	None	110		110		None
08A-0085-C1GS	8310	J	11700	JF	*1.408	680	J	972	JF	*1.429	1900	J	1900	J	None	1320	J	1320	J	None	387	J	387	J	None
08A-0085-C1HS	1880		2650	F	*1.410	172		246	F	*1.430	386		386		None	361		361		None	91.8		91.8		None
08A-0085-C1IS	217		306	F	*1.410	27.2	J	27.2	J	ND or <QL	26.1		26.1		None	45.1		45.1		None	7.82	J	7.82	J	ND or <QL
08A-0085-C1JS	< 28.3	U	< 28.3	U	ND or <QL	2.85	J	2.85	J	ND or <QL	< 4.03	U	< 4.03	U	ND or <QL	2.87	J	2.87	J	ND or <QL	1.09	J	1.09	J	ND or <QL
08A-0086-C3AS	275		387	F	*1.407	15.6	J	15.6	J	ND or <QL	51.5		51.5		None	21.2		21.2		None	13.8	J	13.8	J	ND or <QL
08A-0086-C3BS	66.9		94.2	F	*1.408	4.19	J	4.19	J	ND or <QL	13	J	13	J	ND or <QL	5.84	J	5.84	J	ND or <QL	2.39	J	2.39	J	ND or <QL
08A-0086-C3BT	61.4		86.5	F	*1.409	3.98	J	3.98	J	ND or <QL	12.7	J	12.7	J	ND or <QL	7.87	J	7.87	J	ND or <QL	4.12	J	4.12	J	ND or <QL

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	OCDD 3268-87-9 ng/kg					OCDF 39001-02-0 ng/kg					Total HpCDD HPCDD ng/kg					Total HpCDF HPCDF ng/kg					Total HxCDD HXCDD ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0086-C3CS	< 18.7	U	< 18.7	U	ND or <QL	< 0.616	U	< 0.616	U	ND or <QL	< 3.07	U	< 3.07	U	ND or <QL	< 1.08	U	< 1.08	U	ND or <QL	0.243	J	0.243	J	ND or <QL
08A-0086-C3DS	< 12.2	U	< 12.2	U	ND or <QL	< 0.468	UJ	< 0.468	UJ	ND or <QL	< 1.56	U	< 1.56	U	ND or <QL	< 0.147	U	< 0.147	U	ND or <QL	< 0.0892	U	< 0.0892	U	ND or <QL
08A-0086-C3ES	< 3.65	U	< 3.65	U	ND or <QL	< 0.621	U	< 0.621	U	ND or <QL	< 0.646	U	< 0.646	U	ND or <QL	< 0.0963	U	< 0.0963	U	ND or <QL	< 0.0644	U	< 0.0644	U	ND or <QL
08A-0087-C3AS	162		228	F	*1.407	26.3	J	26.3	J	ND or <QL	30.3		30.3		None	11.7	J	11.7	J	ND or <QL	5.28	J	5.28	J	ND or <QL
08A-0087-C3BS	< 9.01	U	< 9.01	U	ND or <QL	13.6	J	13.6	J	ND or <QL	< 0.897	U	< 0.897	U	ND or <QL	< 0.558	U	< 0.558	U	ND or <QL	< 0.126	U	< 0.126	U	ND or <QL
08A-0087-C3CS	< 21.1	UJ	< 21.1	UJ	ND or <QL	11.8	J	11.8	J	ND or <QL	< 2.24	U	< 2.24	U	ND or <QL	< 0.219	U	< 0.219	U	ND or <QL	< 0.206	U	< 0.206	U	ND or <QL
08A-0087-C3DS	21.4	J	21.4	J	ND or <QL	< 0.253	UJ	< 0.253	UJ	ND or <QL	< 2.22	U	< 2.22	U	ND or <QL	< 0.0435	U	< 0.0435	U	ND or <QL	< 0.472	U	< 0.472	U	ND or <QL
08A-0088-C1AS	150		211	F	*1.407	6.98	J	6.98	J	ND or <QL	17.4		17.4		None	6.05	J	6.05	J	ND or <QL	2.54	J	2.54	J	ND or <QL
08A-0088-C1BS	< 4.04	U	< 4.04	U	ND or <QL	< 0.119	U	< 0.119	U	ND or <QL	< 0.978	U	< 0.978	U	ND or <QL	< 0.0780	U	< 0.0780	U	ND or <QL	0.171	J	0.171	J	ND or <QL
08A-0088-C1CS	< 4.89	U	< 4.89	U	ND or <QL	< 0.187	U	< 0.187	U	ND or <QL	< 1.65	U	< 1.65	U	ND or <QL	< 0.154	U	< 0.154	U	ND or <QL	0.193	J	0.193	J	ND or <QL
08A-0089-C2AS	1150		1620	F	*1.409	50.3		71.9	F	*1.429	306		306		None	49		49		None	37		37		None
08A-0089-C2BS	389		289	B	Split-Replaced	31.6	J	56	B	Split-Replaced	92.3		72.5		Split-Replaced	27.5		39.1	B	Split-Replaced	15.9	J	13.7		Split-Replaced
08A-0089-C2CS	280		357	B	Split-Replaced	20.6	J	25.8	B	Split-Replaced	69.4		121		Split-Replaced	24.1		40.3	B	Split-Replaced	17.1	J	54.7		Split-Replaced
08A-0089-C2DS	257		362	F	*1.409	25.3	J	25.3	J	ND or <QL	52.6		52.6		None	26.3		26.3		None	11.8	J	11.8	J	ND or <QL
08A-0089-C2ES	226		318	F	*1.407	20.9	J	20.9	J	ND or <QL	41.1		41.1		None	27.3		27.3		None	11.1	J	11.1	J	ND or <QL
08A-0090-C5AS	322		453	F	*1.407	< 21.0	U	< 21.0	U	ND or <QL	54.2		54.2		None	41.1		41.1		None	13.1	J	13.1	J	ND or <QL
08A-0090-C5BS	< 47.4	U	< 47.4	U	ND or <QL	< 4.52	U	< 4.52	U	ND or <QL	< 6.30	U	< 6.30	U	ND or <QL	< 6.41	U	< 6.41	U	ND or <QL	< 1.50	U	< 1.50	U	ND or <QL
08A-0092-C1AS	1080		1520	F	*1.407	97.5		139	F	*1.426	284		284		None	79.8		79.8		None	33.8	J	33.8	J	None
08A-0096-C3AS	666		938	F	*1.408	< 50.2	U	< 50.2	U	ND or <QL	143		143		None	55.2		55.2		None	26.2		26.2		None
08A-0096-C3BS	1970		2770	F	*1.406	136		194	F	*1.426	359		359		None	142		142		None	60.3		60.3		None
08A-0098-C1AS	3520		4960	F	*1.409	242		346	F	*1.430	682		682		None	247		247		None	65		65		None
08A-0098-C1BS	2860		4030	F	*1.409	173		247	F	*1.428	532		532		None	218		218		None	72.9		72.9		None
08A-0098-C1CS	5960	J	8390	JF	*1.408	672	J	960	JF	*1.429	388	J	388	J	None	1530	J	1530	J	None	130	J	130	J	None
08A-0098-C1DS	1210	J	1700	JF	*1.405	100	J	143	JF	*1.430	< 16.6	UJ	< 16.6	UJ	ND or <QL	66.4	J	66.4	J	None	7.72	J	7.72	J	ND or <QL
08A-0098-C1ES	1760	J	1940	B	Split-Replaced	219	J	297	B	Split-Replaced	54.2	J	64.7		Split-Replaced	100	J	158	B	Split-Replaced	5.83	J	17.4		Split-Replaced
08A-0098-C1FS	2540	J	2440	B	Split-Replaced	132	J	125	B	Split-Replaced	81.1	J	92.3		Split-Replaced	78.9	J	78.3	B	Split-Replaced	16.3	J	23.7		Split-Replaced
08A-0098-C1GS	2620	J	3690	JF	*1.408	115	J	164	JF	*1.426	82.3	J	82.3	J	None	81.4	J	81.4	J	None	14.3	J	14.3	J	ND or <QL
08A-0099-C1AS	477		672	F	*1.409	29.1		41.6	F	*1.430	82		82		None	30.3		30.3		None	15.1		15.1		None
08A-0099-C1BS	3680		5180	F	*1.408	150		214	F	*1.427	502		502		None	138		138		None	68.9		68.9		None
08A-0099-C1CS	14900	J	21000	JF	*1.409	927	J	1320	JF	*1.424	3870	J	3870	J	None	663	J	663	J	None	432	J	432	J	None
08A-0099-C1DS	10400	J	14600	JF	*1.404	491	J	702	JF	*1.430	1450	J	1450	J	None	446	J	446	J	None	145	J	145	J	None
08A-0099-C1ES	24100	J	33900	JF	*1.407	732		1050	F	*1.434	3050		3050		None	905		905		None	329		329		None
08A-0099-C1FS	2350		3310	F	*1.409	< 37.3	U	< 37.3	U	ND or <QL	82.5		82.5		None	22.7	J	22.7	J	ND or <QL	12.1	J	12.1	J	ND or <QL
08A-0100-C1AS	533		750	F	*1.407	35.5		50.7	F	*1.428	83.9		83.9		None	31.8		31.8		None	8.79	J	8.79	J	ND or <QL
08A-0100-C1BS	1940	J	2730	JF	*1.407	< 11.0	UJ	< 11.0	UJ	ND or <QL	75.4	J	75.4	J	None	< 8.61	UJ	< 8.61	UJ	ND or <QL	10.8	J	10.8	J	ND or <QL
08A-0100-C1CS	863		1220	F	*1.414	< 0.462	U	< 0.462	U	ND or <QL	52.3		52.3		None	< 0.211	U	< 0.211	U	ND or <QL	7.77	J	7.77	J	ND or <QL
08A-0100-C1DS	1340		1890	F	*1.410	< 0.327	U	< 0.327	U	ND or <QL	62.5		62.5		None	< 0.232	U	< 0.232	U	ND or <QL	14.3	J	14.3	J	ND or <QL
08A-0101-C1AS	22300	J	31400	JF	*1.408	1080	J	1540	JF	*1.426	3360	J	3360	J	None	1370	J	1370	J	None	459	J	459	J	None
08A-0101-C1BS	10200	J	14400	JF	*1.412	1070	J	1530	JF	*1.430	1870	J	1870	J	None	1310	J	1310	J	None	260	J	260	J	None
08A-0101-C1CS	5060	J	7120	JF	*1.407	494	J	706	JF	*1.429	735	J	735	J	None	1050	J	1050	J	None	160	J	160	J	None
08A-0101-C1DS	2690	J	3790	JF	*1.409	260		372	F	*1.431	300	J	300	J	None	437	J	437	J	None	55.6	J	55.6	J	None
08A-0101-C1ES	1620	J	2280	JF	*1.407	255	J	364	JF	*1.427	58.6	J	58.6	J	None	165	J	165	J	None	17.1	J	17.1	J	ND or <QL
08A-0101-C1FS	363	J	511	JF	*1.408	18.4	J	18.4	J	ND or <QL	16.5	J	16.5	J	ND or <QL	11.9	J	11.9	J	ND or <QL	2.46	J	2.46	J	ND or <QL
08A-0101-C1GS	100	J	141	JF	*1.410	< 5.83	UJ	< 5.83	UJ	ND or <QL	< 5.29	UJ	< 5.29	UJ	ND or <QL	< 6.12	UJ	< 6.12	UJ	ND or <QL	< 0.815	UJ	< 0.815	UJ	ND or <QL
08A-0103-C1AS	192		270	F	*1.406	8.37	J	8.37	J	ND or <QL	30.8		30.8		None	13	J	13	J	ND or <QL	5.52	J	5.52	J	ND or <QL
08A-0103-C1ES	504		710	F	*1.409	< 0.171	U	< 0.171	U	ND or <QL	32.5		32.5		None	< 0.0589	U	< 0.0589	U	ND or <QL	8.36	J	8.36	J	ND or <QL
08A-0103-C1FS	302		425	F	*1.407	< 0.307	U	< 0.307	U	ND or <QL	18.9		18.9		None	< 0.257	U	< 0.257	U	ND or <QL	3.4	J	3.4	J	ND or <QL
08A-0103-C2BS	257		362	F	*1.409	< 4.64	U	< 4.64	U	ND or <QL	18.8		18.8		None	< 3.94	U	< 3.94	U	ND or <QL	2.85	J	2.85	J	ND or <QL
08A-0103-C2CS	96.2		135	F	*1.403	< 0.476	UJ	< 0.476	UJ	ND or <QL	8.92	J	8.92	J	ND or <QL	< 0.236	U	< 0.236	U	ND or <QL	2.2	J	2.2	J	ND or <QL
08A-0103-C2DS	1070		1510	F	*1.411	< 2.62	U	< 2.62	U	ND or <QL	90.9		90.9		None	< 1.59	U	< 1.59	U	ND or <QL	34.5		34.5		None
08A-0104-C1AS	4640	J	6530	JF	*1.407	394	J	563	JF	*1.429	820	J	820	J	None	856	J	856	J	None	138	J	138	J	None
08A-0104-C1BS	488		687	F	*1.408	< 29.9	U	< 29.9	U	ND or <QL	20.5		20.5		None	77.3		77.3		None	2.05	J	2.05	J	ND or <QL
08A-0104-C1CS	289		407	F	*1.408	< 18.2	U	< 18.2	U	ND or <QL	< 5.46	U	< 5.46	U	ND or <QL	< 2.36	U	< 2.36	U	ND or <QL	< 1.19	U	< 1.19	U	ND or <QL

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	OCDD 3268-87-9 ng/kg					OCDF 39001-02-0 ng/kg					Total HpCDD HPCDD ng/kg					Total HpCDF HPCDF ng/kg					Total HxCDD HXCDD ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0104-C1DS	307	J	432	JF	*1.407	85.8	J	123	JF	*1.434	< 18.0	UJ	< 18.0	UJ	ND or <QL	23.1	J	23.1	J	ND or <QL	4.69	J	4.69	J	ND or <QL
08A-0104-C1ES	653	J	919	JF	*1.407	205	J	293	JF	*1.429	< 31.0	UJ	< 31.0	UJ	ND or <QL	103	J	103	J	None	8.05	J	8.05	J	ND or <QL
08A-0104-C1FS	651		917	F	*1.409	29.4	J	29.4	J	ND or <QL	26.1	J	26.1	J	ND or <QL	23.5	J	23.5	J	ND or <QL	6.78	J	6.78	J	ND or <QL
08A-0104-C1FT	162	J	228	JF	*1.407	< 8.56	UJ	< 8.56	UJ	ND or <QL	< 8.54	UJ	< 8.54	UJ	ND or <QL	< 7.94	UJ	< 7.94	UJ	ND or <QL	1.78	J	1.78	J	ND or <QL
08A-0104-C1GS	218	J	307	JF	*1.408	13.8	J	13.8	J	ND or <QL	< 11.1	UJ	< 11.1	UJ	ND or <QL	< 9.51	UJ	< 9.51	UJ	ND or <QL	4.43	J	4.43	J	ND or <QL
08A-0106-C1AS	< 57.3	U	< 57.3	U	ND or <QL	< 3.63	U	< 3.63	U	ND or <QL	< 11.7	U	< 11.7	U	ND or <QL	4.64	J	4.64	J	ND or <QL	3.98	J	3.98	J	ND or <QL
08A-0107-C2AS	116		163	F	*1.405	< 5.71	U	< 5.71	U	ND or <QL	17.6	J	17.6	J	ND or <QL	5.42	J	5.42	J	ND or <QL	4.95	J	4.95	J	ND or <QL
08A-0108-C1AS	639		900	F	*1.408	44.5		63.6	F	*1.429	153		153		None	41.5		41.5		None	22.1		22.1		None
08A-0108-C1BS	433		610	F	*1.409	28.9	J	28.9	J	ND or <QL	81.8		81.8		None	33.5		33.5		None	17.2	J	17.2	J	ND or <QL
08A-0109-C3AS	1190	J	1680	JF	*1.412	< 3.13	UJ	< 3.13	UJ	ND or <QL	126	J	126	J	None	3.12	J	3.12	J	ND or <QL	17.7	J	17.7	J	ND or <QL
08A-0109-C3BS	760		1070	F	*1.408	< 0.442	U	< 0.442	U	ND or <QL	50.3		50.3		None	< 0.489	U	< 0.489	U	ND or <QL	5.24	J	5.24	J	ND or <QL
08A-0109-C3CS	630		887	F	*1.408	5.48	J	5.48	J	ND or <QL	62.7		62.7		None	3.19	J	3.19	J	ND or <QL	8.57	J	8.57	J	ND or <QL
08A-0109-C3DS	127		179	F	*1.409	< 0.255	U	< 0.255	U	ND or <QL	18.8		18.8		None	< 0.237	U	< 0.237	U	ND or <QL	3.94	J	3.94	J	ND or <QL
08A-0109-C3ES	< 5.22	U	< 5.22	U	ND or <QL	< 0.504	U	< 0.504	U	ND or <QL	< 2.43	U	< 2.43	U	ND or <QL	< 0.0604	U	< 0.0604	U	ND or <QL	< 0.0648	U	< 0.0648	U	ND or <QL
08A-0109-C3ET	< 10.8	U	< 10.8	U	ND or <QL	< 0.545	U	< 0.545	U	ND or <QL	< 3.63	U	< 3.63	U	ND or <QL	< 0.284	U	< 0.284	U	ND or <QL	< 0.105	U	< 0.105	U	ND or <QL
08A-0110-C1AS	2120		2980	F	*1.406	173		247	F	*1.428	468		468		None	203		203		None	70.3		70.3		None
08A-0110-C1BS	569		801	F	*1.408	67.9		97	F	*1.429	146		146		None	71.9		71.9		None	28.2		28.2		None
08A-0110-C1CS	2560		3600	F	*1.406	263		376	F	*1.430	553		553		None	277		277		None	99.6		99.6		None
08A-0110-C1DS	< 77.7	UJ	< 77.7	UJ	ND or <QL	< 8.78	UJ	< 8.78	UJ	ND or <QL	20	J	20	J	ND or <QL	< 11.2	UJ	< 11.2	UJ	ND or <QL	< 0.331	UJ	< 0.331	UJ	ND or <QL
08A-0110-C1ES	112		158	F	*1.411	< 1.35	U	< 1.35	U	ND or <QL	12.4	J	12.4	J	ND or <QL	< 0.409	U	< 0.409	U	ND or <QL	< 0.285	U	< 0.285	U	ND or <QL
08A-0110-C1FS	85.5		120	F	*1.404	< 2.59	U	< 2.59	U	ND or <QL	< 9.4	U	< 9.4	U	ND or <QL	< 1.84	U	< 1.84	U	ND or <QL	0.641	J	0.641	J	ND or <QL
08A-0110-C1GS	< 46.7	U	< 46.7	U	ND or <QL	< 0.87	U	< 0.87	U	ND or <QL	< 2.79	U	< 2.79	U	ND or <QL	< 0.189	U	< 0.189	U	ND or <QL	< 0.146	U	< 0.146	U	ND or <QL
08A-0111-C1AS	68.9		97	F	*1.408	6.55	J	6.55	J	ND or <QL	12		12		None	4.58	J	4.58	J	ND or <QL	2.8	J	2.8	J	ND or <QL
08A-0111-C1BS	252		355	F	*1.409	11	J	11	J	ND or <QL	41.3		41.3		None	9.99	J	9.99	J	ND or <QL	12	J	12	J	ND or <QL
08A-0111-C1CS	8480		11900	F	*1.403	573		819	F	*1.429	1290		1290		None	368		368		None	117		117		None
08A-0111-C1DS	341		480	F	*1.408	37.6		53.7	F	*1.428	73.5		73.5		None	29.8		29.8		None	13	J	13	J	ND or <QL
08A-0112-C2AS	328		462	F	*1.409	28.2	J	28.2	J	ND or <QL	68.6		68.6		None	25.2	J	25.2	J	ND or <QL	10.9	J	10.9	J	ND or <QL
08A-0112-C2BS	876		1230	F	*1.404	68.3		97.6	F	*1.429	142		142		None	61.3		61.3		None	23.4		23.4		None
08A-0112-C2CS	298		420	F	*1.409	< 18.6	U	< 18.6	U	ND or <QL	59.2		59.2		None	25.6		25.6		None	16.2	J	16.2	J	ND or <QL
08A-0112-C2DS	144		203	F	*1.410	< 7.68	U	< 7.68	U	ND or <QL	< 27.0	U	< 27.0	U	ND or <QL	15.3	J	15.3	J	ND or <QL	4.34	J	4.34	J	ND or <QL
08A-0113-C1AS	705		993	F	*1.409	135		193	F	*1.430	133		133		None	77.2		77.2		None	20		20		None
08A-0113-C1BS	1370		1930	F	*1.409	135		193	F	*1.430	302		302		None	99.8		99.8		None	45.3		45.3		None
08A-0113-C1CS	1110	J	1560	JF	*1.405	98.8	J	141	JF	*1.427	263	J	263	J	None	80.6	J	80.6	J	None	39.3	J	39.3	J	None
08A-0114-C2AS	2320	J	3270	JF	*1.409	630		900	F	*1.429	425		425		None	624		624		None	123		123		None
08A-0114-C2BS	695		979	F	*1.409	23.5	J	23.5	J	ND or <QL	64.3		64.3		None	16.8	J	16.8	J	ND or <QL	21.1	J	21.1	J	ND or <QL
08A-0114-C2CS	485		683	F	*1.408	7.61	J	7.61	J	ND or <QL	32.9		32.9		None	7.03	J	7.03	J	ND or <QL	6.1	J	6.1	J	ND or <QL
08A-0114-C2DS	714		1010	F	*1.415	14	J	14	J	ND or <QL	23.2		23.2		None	9.37	J	9.37	J	ND or <QL	6.01	J	6.01	J	ND or <QL
08A-0114-C2ES	322		453	F	*1.407	3.97	J	3.97	J	ND or <QL	28.2		28.2		None	2.56	J	2.56	J	ND or <QL	6.05	J	6.05	J	ND or <QL
08A-0114-C2FS	< 7.25	U	< 7.25	U	ND or <QL	< 0.475	U	< 0.475	U	ND or <QL	< 1.54	U	< 1.54	U	ND or <QL	< 0.0703	U	< 0.0703	U	ND or <QL	0.351	J	0.351	J	ND or <QL
08A-0115-C1AS	4430	J	6240	JF	*1.409	3160	J	4520	JF	*1.430	1550	J	1550	J	None	1490	J	1490	J	None	183	J	183	J	None
08A-0115-C1BS	6520	J	9180	JF	*1.408	2900	J	4140	JF	*1.428	1310	J	1310	J	None	1910	J	1910	J	None	256	J	256	J	None
08A-0115-C1CS	20600	J	29000	JF	*1.408	24900	J	35600	JF	*1.430	3360	J	3360	J	None	3810	J	3810	J	None	879	J	879	J	None
08A-0115-C1CT	30500	J	42900	JF	*1.407	17300	J	24700	JF	*1.428	5450	J	5450	J	None	6940	J	6940	J	None	1080	J	1080	J	None
08A-0115-C1DS	25600	J	36000	JF	*1.406	7860	J	11200	JF	*1.425	5550	J	5550	J	None	3220	J	3220	J	None	1360	J	1360	J	None
08A-0115-C1ES	815	J	1150	JF	*1.411	919	J	1310	JF	*1.425	229	J	229	J	None	545	J	545	J	None	84.6	J	84.6	J	None
08A-0115-C1FS	1420		2000	F	*1.408	89.8		128	F	*1.425	87.1		87.1		None	91.8		91.8		None	50.7		50.7		None
08A-0115-D1AS	791		1110	F	*1.403	163		233	F	*1.429	183		183		None	122		122		None	41.9		41.9		None
08A-0115-D1BS	590		831	F	*1.408	69.7		99.6	F	*1.429	149		149		None	71.7		71.7		None	73.1		73.1		None
08A-0115-D1CS	5440		7660	F	*1.408	546		780	F	*1.429	1140		1140		None	511		511		None	219		219		None
08A-0115-D1DS	22300	J	31400	JF	*1.408	2370	J	3390	JF	*1.430	4200	J	4200	J	None	1830	J	1830	J	None	664	J	664	J	None
08A-0115-D1ES	26300	J	37000	JF	*1.407	12300	J	17600	JF	*1.431	4860	J	4860	J	None	6230	J	6230	J	None	998	J	998	J	None
08A-0118-C1BS	620	J	873	JF	*1.408	19.2	J	19.2	J	ND or <QL	121	J	121	J	None	27.4		27.4		None	15.3	J	15.3	J	ND or <QL
08A-0118-C1BT	1110	J	1560	JF	*1.405	34.2		48.9	F	*1.430	209	J	209	J	None	43.1		43.1		None	22		22		None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	OCDD 3268-87-9 ng/kg					OCDF 39001-02-0 ng/kg					Total HpCDD HPCDD ng/kg					Total HpCDF HPCDF ng/kg					Total HxCDD HXCDD ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0118-C5AS	315		444	F	*1.410	12.8	J	12.8	J	ND or <QL	71.4		71.4		None	18		18		None	12	J	12	J	ND or <QL
08A-0118-C5CS	81		114	F	*1.407	< 0.359	U	< 0.359	U	ND or <QL	3.78	J	3.78	J	ND or <QL	< 0.0617	U	< 0.0617	U	ND or <QL	< 0.106	U	< 0.106	U	ND or <QL
08A-1070-C2AS	222		313	F	*1.410	12.6	J	12.6	J	ND or <QL	43.7		43.7		None	20.3		20.3		None	10.1	J	10.1	J	ND or <QL

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	Total HxCDF HXCDF ng/kg					Total PeCDD PECDD ng/kg					Total PeCDF PECDF ng/kg					Total TCDD TCDD ng/kg					Total TCDF TCDF ng/kg				
	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0001-C1AS	880	J	880	J	None	42.9	J	42.9	J	None	410	J	410	J	None	110	J	110	J	None	345	J	345	J	None
08A-0001-C1BS	100	J	100	J	None	5.88	J	5.88	J	ND or <QL	82	J	82	J	None	37.6	J	37.6	J	None	116	J	116	J	None
08A-0001-C1CS	431	J	431	J	None	32.9	J	32.9	J	None	272	J	272	J	None	105	J	105	J	None	304	J	304	J	None
08A-0001-C1DS	581	J	581	J	None	48.4	J	48.4	J	None	475	J	475	J	None	262	J	262	J	None	567	J	567	J	None
08A-0001-C1ES	489	J	489	J	None	45.9	J	45.9	J	None	283	J	283	J	None	129	J	129	J	None	360	J	360	J	None
08A-0001-C1FS	59.8	J	59.8	J	None	5.19	J	5.19	J	ND or <QL	47.5	J	47.5	J	None	20.6	J	20.6	J	None	57.7	J	57.7	J	None
08A-0001-C1FT	541	J	541	J	None	55.1	J	55.1	J	None	370	J	370	J	None	159	J	159	J	None	513	J	513	J	None
08A-0001-C1GS	512		512		None	62.6		62.6		None	418		418		None	154		154		None	512		512		None
08A-0001-C1HS	455		455		None	61.2		61.2		None	412		412		None	173		173		None	619		619		None
08A-0001-C1IS	614		614		None	74.2		74.2		None	479		479		None	176		176		None	679		679		None
08A-0001-C1JS	410		410		None	46.5		46.5		None	429		429		None	267		267		None	488		488		None
08A-0001-C1KS	552		552		None	60		60		None	446		446		None	180		180		None	512		512		None
08A-0002-C1AS	< 2.25	UJ	< 2.25	UJ	ND or <QL	< 0.0943	UJ	< 0.0943	UJ	ND or <QL	3.63	J	3.63	J	ND or <QL	< 0.0902	UJ	< 0.0902	UJ	ND or <QL	< 7.53	UJ	< 7.53	UJ	ND or <QL
08A-0002-C1BS	< 1.73	UJ	< 1.73	UJ	ND or <QL	< 0.0800	UJ	< 0.0800	UJ	ND or <QL	3	J	3	J	ND or <QL	< 0.0645	UJ	< 0.0645	UJ	ND or <QL	< 6.80	UJ	< 6.80	UJ	ND or <QL
08A-0002-C1CS	5.7	J	5.7	J	ND or <QL	2.94	J	2.94	J	ND or <QL	6.85	J	6.85	J	ND or <QL	0.756	J	0.756	J	ND or <QL	10		10		None
08A-0002-C1DS	< 0.311	U	< 0.311	U	ND or <QL	< 0.0357	U	< 0.0357	U	ND or <QL	< 0.0203	U	< 0.0203	U	ND or <QL	< 0.0414	U	< 0.0414	U	ND or <QL	< 0.700	U	< 0.700	U	ND or <QL
08A-0002-C1ES	< 0.0281	U	0.192	BJ	Split-Replaced	0.256	J	0.857	BJ	Split-Replaced	< 0.0266	U	0.246	BJ	Split-Replaced	< 0.0450	U	< 0.135	U	Split-Replaced	< 0.265	U	< 0.135	U	Split-Replaced
08A-0002-C1FS	< 0.273	U	0.72	BJ	Split-Replaced	< 0.0527	U	0.351	BJ	Split-Replaced	< 0.0228	U	0.279	BJ	Split-Replaced	< 0.0510	U	0.369	J	Split-Replaced	< 0.150	U	0.181	J	Split-Replaced
08A-0003-C1AS	773	J	773	J	None	67.6	J	67.6	J	None	712	J	712	J	None	410	J	410	J	None	968	J	968	J	None
08A-0003-C1BS	223	J	223	J	None	22.1	J	22.1	J	ND or <QL	217	J	217	J	None	565	J	565	J	None	298	J	298	J	None
08A-0003-C1CS	13.3	J	13.3	J	ND or <QL	< 0.529	UJ	< 0.529	UJ	ND or <QL	19.2	J	19.2	J	ND or <QL	< 0.758	UJ	< 0.758	UJ	ND or <QL	20.9	J	20.9	J	None
08A-0003-C1DS	< 0.378	U	< 0.378	U	ND or <QL	< 0.590	U	< 0.590	U	ND or <QL	< 0.362	U	< 0.362	U	ND or <QL	< 0.645	U	< 0.645	U	ND or <QL	< 3.93	U	< 3.93	U	ND or <QL
08A-0003-C1ES	12.6	J	12.6	J	ND or <QL	5.88	J	5.88	J	ND or <QL	15	J	15	J	ND or <QL	1.96	J	1.96	J	ND or <QL	17.5		17.5		None
08A-0003-C1FS	< 0.691	U	< 0.691	U	ND or <QL	0.464	J	0.464	J	ND or <QL	0.397	J	0.397	J	ND or <QL	0.604	J	0.604	J	ND or <QL	0.289	J	0.289	J	ND or <QL
08A-0003-C1GS	< 0.0539	U	< 0.0539	U	ND or <QL	< 0.0910	U	< 0.0910	U	ND or <QL	< 0.0469	U	< 0.0469	U	ND or <QL	< 0.0903	U	< 0.0903	U	ND or <QL	< 0.115	U	< 0.115	U	ND or <QL
08A-0003-C1HS	< 0.0277	U	< 0.0277	U	ND or <QL	< 0.0963	U	< 0.0963	U	ND or <QL	< 0.0496	U	< 0.0496	U	ND or <QL	< 0.0773	U	< 0.0773	U	ND or <QL	< 0.0730	U	< 0.0730	U	ND or <QL
08A-0004-C1AS	511	J	511	J	None	42.1	J	42.1	J	None	311	J	311	J	None	196	J	196	J	None	372	J	372	J	None
08A-0004-C1BS	383	J	383	J	None	42.4	J	42.4	J	None	290	J	290	J	None	187	J	187	J	None	391	J	391	J	None
08A-0004-C1CS	650	J	650	J	None	34.8	J	34.8	J	ND or <QL	386	J	386	J	None	178	J	178	J	None	397	J	397	J	None
08A-0004-C1DS	448	J	448	J	None	27.1	J	27.1	J	ND or <QL	303	J	303	J	None	120	J	120	J	None	360	J	360	J	None
08A-0004-C1ES	57.7	J	57.7	J	None	< 0.502	UJ	< 0.502	UJ	ND or <QL	41.9	J	41.9	J	None	15.3	J	15.3	J	None	51.7	J	51.7	J	None
08A-0004-C1FS	30.9	J	30.9	J	None	2.29	J	2.29	J	ND or <QL	29.4	J	29.4	J	None	10.8	J	10.8	J	None	32.7	J	32.7	J	None
08A-0004-C1FT	537	J	537	J	None	61.8	J	61.8	J	None	431	J	431	J	None	206	J	206	J	None	490	J	490	J	None
08A-0004-C1GS	19.8	J	19.8	J	ND or <QL	1.19	J	1.19	J	ND or <QL	16.7	J	16.7	J	ND or <QL	8.49		8.49		None	25.1		25.1		None
08A-0004-C1HS	311		311		None	38.4		38.4		None	362		362		None	233		233		None	537		537		None
08A-0004-C1IS	511	J	511	J	None	64	J	64	J	None	507	J	507	J	None	250	J	250	J	None	738	J	738	J	None
08A-0004-C1IT	181	J	181	J	None	10.4	J	10.4	J	ND or <QL	118	J	118	J	None	58.4	J	58.4	J	None	182	J	182	J	None
08A-0004-C1JS	628		628		None	59.4		59.4		None	631		631		None	292		292		None	810		810		None
08A-0004-C1KS	73		73		None	71.1		71.1		None	84.9		84.9		None	38		38		None	120		120		None
08A-0004-C1LS	514	J	514	J	None	90.3	J	90.3	J	None	1660	J	1660	J	None	974	J	974	J	None	3310	J	3310	J	None
08A-0005-C1AS	177	J	177	J	None	12.9	J	12.9	J	ND or <QL	179	J	179	J	None	118	J	118	J	None	200	J	200	J	None
08A-0005-C1BS	407	J	407	J	None	46.7	J	46.7	J	None	437	J	437	J	None	331	J	331	J	None	500	J	500	J	None
08A-0005-C1CS	165	J	165	J	None	12.1	J	12.1	J	ND or <QL	182	J	182	J	None	123	J	123	J	None	210	J	210	J	None
08A-0005-C1DS	487	J	487	J	None	35.2	J	35.2	J	ND or <QL	408	J	408	J	None	285	J	285	J	None	478	J	478	J	None
08A-0005-C1ES	435	J	435	J	None	36.8	J	36.8	J	None	513	J	513	J	None	281	J	281	J	None	534	J	534	J	None
08A-0005-C1FS	206		206		None	9.1	J	9.1	J	ND or <QL	113		113		None	39.5		39.5		None	115		115		None
08A-0005-C1GS	423		423		None	66.1		66.1		None	497		497		None	253		253		None	627		627		None
08A-0005-C1HS	938		938		None	105		105		None	1580		1580		None	665		665		None	1910		1910		None
08A-0006-C1AS	217	J	217	J	None	25.6	J	25.6	J	None	194	J	194	J	None	123	J	123	J	None	235	J	235	J	None
08A-0006-C1AT	405	J	405	J	None	32.5		32.5		None	391	J	391	J	None	256	J	256	J	None	459	J	459	J	None
08A-0006-C1BS	666	J	670	B	Split-Replaced	43.3	J	66.6		Split-Replaced	560	J	544	B	Split-Replaced	287	J	382	B	Split-Replaced	623	J	722	B	Split-Replaced
08A-0006-C1CS	717	J	717	J	None	43.2	J	43.2	J	None	609	J	609	J	None	277	J	277	J	None	655	J	655	J	None
08A-0006-C1DS	269		550	B	Split-Replaced	16.7	J	46.6		Split-Replaced	218		398	B	Split-Replaced	90.5		204	B	Split-Replaced	217		475	B	Split-Replaced

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	Total HxCDF HxCDF ng/kg					Total PeCDD PeCDD ng/kg					Total PeCDF PeCDF ng/kg					Total TCDD TCDD ng/kg					Total TCDF TCDF ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0006-C1ES	18.1	J	18.1	J	ND or <QL	18.7	J	18.7	J	ND or <QL	13.8	J	13.8	J	ND or <QL	15.2		15.2		None	22.8		22.8		None
08A-0006-C1FS	< 0.0933	U	< 0.0933	U	ND or <QL	< 0.181	U	< 0.181	U	ND or <QL	< 0.116	U	< 0.116	U	ND or <QL	< 0.310	U	< 0.310	U	ND or <QL	< 0.277	U	< 0.277	U	ND or <QL
08A-0006-C1GS	18.1	J	18.1	J	ND or <QL	1.95	J	1.95	J	ND or <QL	22.8		22.8		None	16.6	J	16.6	J	None	35.1		35.1		None
08A-0006-C1HS	10.7	J	10.7	J	ND or <QL	< 0.198	U	< 0.198	U	ND or <QL	15.4	J	15.4	J	ND or <QL	16.3		16.3		None	27.6		27.6		None
08A-0006-C1IS	14.9	J	14.9	J	ND or <QL	0.786	J	0.786	J	ND or <QL	24		24		None	23.8		23.8		None	43.5		43.5		None
08A-0006-C1JS	5.91	J	5.91	J	ND or <QL	5.13	J	5.13	J	ND or <QL	7.45	J	7.45	J	ND or <QL	8.9		8.9		None	13.2		13.2		None
08A-0006-C1KS	10.2	J	10.2	J	ND or <QL	< 0.210	U	< 0.210	U	ND or <QL	13.2	J	13.2	J	ND or <QL	15.9		15.9		None	24.8		24.8		None
08A-0007-C2AS	259	J	259	J	None	18.4	J	18.4	J	ND or <QL	281	J	281	J	None	192	J	192	J	None	338	J		J	None
08A-0007-C2BS	451	J	451	J	None	45.6	J	45.6	J	None	427	J	427	J	None	261	J	261	J	None	539	J	539	J	None
08A-0007-C2CS	229	J	229	J	None	11	J	11	J	ND or <QL	177	J	177	J	None	93.5	J	93.5	J	None	214	J	214	J	None
08A-0007-C2DS	11.9	J	11.9	J	ND or <QL	< 0.148	U	< 0.148	U	ND or <QL	8.43	J	8.43	J	ND or <QL	4.42		4.42		None	10.7		10.7		None
08A-0007-C2ES	< 0.0819	U	< 0.0819	U	ND or <QL	< 0.211	U	< 0.211	U	ND or <QL	< 0.146	U	< 0.146	U	ND or <QL	< 0.185	U	< 0.185	U	ND or <QL	< 0.139	U	< 0.139	U	ND or <QL
08A-0007-C2FS	< 0.0781	U	< 0.0781	U	ND or <QL	< 0.154	U	< 0.154	U	ND or <QL	0.509	J	0.509	J	ND or <QL	< 0.156	U	< 0.156	U	ND or <QL	1.41	J	1.41	J	ND or <QL
08A-0007-C2GS	2.43	J	2.43	J	ND or <QL	< 0.149	U	< 0.149	U	ND or <QL	2.41	J	2.41	J	ND or <QL	< 0.162	U	< 0.162	U	ND or <QL	1.79	J	1.79	J	ND or <QL
08A-0007-C2HS	10.4	J	10.4	J	ND or <QL	2.04	J	2.04	J	ND or <QL	9.84	J	9.84	J	ND or <QL	8.18		8.18		None	13.1		13.1		None
08A-0007-C2IS	< 1.44	U	< 1.44	U	ND or <QL	< 0.200	U	< 0.200	U	ND or <QL	0.429	J	0.429	J	ND or <QL	1.26	J	1.26	J	ND or <QL	< 0.317	U	< 0.317	U	ND or <QL
08A-0007-C2JS	< 0.646	U	< 0.646	U	ND or <QL	< 0.137	U	< 0.137	U	ND or <QL	0.417	J	0.417	J	ND or <QL	0.233	J	0.233	J	ND or <QL	1.55	J	1.55	J	ND or <QL
08A-0007-C2KS	1.57	J	1.57	J	ND or <QL	0.593	J	0.593	J	ND or <QL	0.228	J	0.228	J	ND or <QL	< 0.144	U	< 0.144	U	ND or <QL	0.49	J	0.49	J	ND or <QL
08A-0007-C2LS	< 0.660	U	< 0.660	U	ND or <QL	0.322	J	0.322	J	ND or <QL	< 0.0901	U	< 0.0901	U	ND or <QL	< 0.110	U	< 0.110	U	ND or <QL	< 0.170	U	< 0.170	U	ND or <QL
08A-0008-C1AS	329	J	329	J	None	31.4	J	31.4	J	None	272	J	272	J	None	165	J	165	J	None	245	J	245	J	None
08A-0008-C1BS	338	J	338	J	None	32.1	J	32.1	J	ND or <QL	294	J	294	J	None	183	J	183	J	None	346	J	346	J	None
08A-0008-C1CS	428	J	428	J	None	26	J	26	J	ND or <QL	358	J	358	J	None	226	J	226	J	None	431	J	431	J	None
08A-0008-C1DS	384	J	384	J	None	34.8	J	34.8	J	None	377	J	377	J	None	191	J	191	J	None	445	J	445	J	None
08A-0008-C1ES	518	J	518	J	None	86.5	J	86.5	J	None	455	J	455	J	None	251	J	251	J	None	564	J	564	J	None
08A-0008-C1ET	491	J	491	J	None	36.2	J	36.2	J	None	426	J	426	J	None	222	J	222	J	None	538	J	538	J	None
08A-0008-C1FS	460	J	460	J	None	43.5	J	43.5	J	None	403	J	403	J	None	358	J	358	J	None	514	J	514	J	None
08A-0008-C1GS	470		470		None	43.9		43.9		None	392		392		None	181		181		None	547		547		None
08A-0008-C1HS	460		460		None	41.7		41.7		None	440		440		None	262		262		None	622		622		None
08A-0008-C1IS	621	J	621	J	None	102	J	102	J	None	684	J	684	J	None	381	J	381	J	None	924	J	924	J	None
08A-0008-C1JS	996		996		None	149		149		None	2490		2490		None	1250		1250		None	4710		4710		None
08A-0008-C1KS	990		990		None	56.4		56.4		None	698		698		None	314		314		None	639		639		None
08A-0009-C3AS	458	J	458	J	None	34.5	J	34.5	J	ND or <QL	427	J	427	J	None	331	J	331	J	None	437	J	437	J	None
08A-0009-C3BS	112	J	112	J	None	8.6	J	8.6	J	ND or <QL	109	J	109	J	None	67.8	J	67.8	J	None	112	J	112	J	None
08A-0009-C3CS	601	J	601	J	None	72	J	72	J	None	565	J	565	J	None	378	J	378	J	None	583	J	583	J	None
08A-0009-C3DS	596	J	596	J	None	33	J	33	J	ND or <QL	533	J	533	J	None	258	J	258	J	None	553	J	553	J	None
08A-0009-C3ES	105	J	105	J	None	4.86	J	4.86	J	ND or <QL	104	J	104	J	None	57.3	J	57.3	J	None	123	J	123	J	None
08A-0009-C3FS	342	J	342	J	None	20.4	J	20.4	J	ND or <QL	312	J	312	J	None	150	J	150	J	None	423	J	423	J	None
08A-0009-C3GS	687	J	687	J	None	127	J	127	J	None	812	J	812	J	None	436	J	436	J	None	1200	J	1200	J	None
08A-0009-C3HS	709	J	709	J	None	94.2	J	94.2	J	None	1100	J	1100	J	None	755	J	755	J	None	1550	J	1550	J	None
08A-0009-C3IS	1530	J	1530	J	None	221	J	221	J	None	1120	J	1120	J	None	645	J	645	J	None	1080	J	1080	J	None
08A-0010-C2AS	367	J	367	J	None	23.8	J	23.8	J	ND or <QL	358	J	358	J	None	252	J	252	J	None	342	J	342	J	None
08A-0010-C2BS	456	J	456	J	None	40.2	J	40.2	J	ND or <QL	463	J	463	J	None	337	J	337	J	None	518	J	518	J	None
08A-0010-C2CS	211	J	211	J	None	120	J	120	J	None	229	J	229	J	None	134	J	134	J	None	235	J	235	J	None
08A-0010-C2DS	169	J	169	J	None	13.9	J	13.9	J	ND or <QL	152	J	152	J	None	89.5	J	89.5	J	None	166	J	166	J	None
08A-0010-C2ES	234	J	234	J	None	21.5	J	21.5	J	ND or <QL	223	J	223	J	None	171	J	171	J	None	226	J	226	J	None
08A-0010-C2ET	342	J	342	J	None	22.4	J	22.4	J	ND or <QL	276	J	276	J	None	159	J	159	J	None	266	J	266	J	None
08A-0010-C2FS	104	J	104	J	None	4.24	J	4.24	J	ND or <QL	87.9	J	87.9	J	None	6.11	J	6.11	J	None	74.3	J	74.3	J	None
08A-0010-C2GS	66.9	J	66.9	J	None	< 0.555	UJ	< 0.555	UJ	ND or <QL	52.8	J	52.8	J	None	17.3	J	17.3	J	None	58.5	J	58.5	J	None
08A-0010-C2HS	801	J	801	J	None	82.7	J	82.7	J	None	731	J	731	J	None	303	J	303	J	None	818	J	818	J	None
08A-0010-C2IS	816	J	816	J	None	121	J	121	J	None	782	J	782	J	None	420	J	420	J	None	997	J	997	J	None
08A-0010-C2JS	836		836		None	146		146		None	906		906		None	591		591		None	1140		1140		None
08A-0010-C2KS	907		907		None	173		173		None	975		975		None	684		684		None	1390		1390		None
08A-0010-C2LS	1090	J	1090	J	None	200	J	200	J	None	1350	J	1350	J	None	724	J	724	J	None	1970	J	1970	J	None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	Total HxCDF HxCDF ng/kg					Total PeCDD PeCDD ng/kg					Total PeCDF PeCDF ng/kg					Total TCDD TCDD ng/kg					Total TCDF TCDF ng/kg				
	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0010-C2MS	169	J	169	J	None	19.5	J	19.5	J	ND or <QL	237	J	237	J	None	102	J	102	J	None	391	J	391	J	None
08A-0011-C1AS	496	J	496	J	None	36.8	J	36.8	J	None	478	J	478	J	None	646	J	646	J	None	675	J	675	J	None
08A-0011-C1BS	25.1		25.1		None	1.11	J	1.11	J	ND or <QL	18.3	J	18.3	J	ND or <QL	15.2		15.2		None	22.6		22.6		None
08A-0011-C1CS	< 0.128	U	< 0.128	U	ND or <QL	< 0.195	U	< 0.195	U	ND or <QL	< 0.182	U	< 0.182	U	ND or <QL	< 0.226	U	< 0.226	U	ND or <QL	< 0.162	U	< 0.162	U	ND or <QL
08A-0011-C1DS	< 0.0893	U	< 0.0893	U	ND or <QL	< 0.168	U	< 0.168	U	ND or <QL	< 0.125	U	< 0.125	U	ND or <QL	< 0.193	U	< 0.193	U	ND or <QL	< 0.149	U	< 0.149	U	ND or <QL
08A-0011-C1ES	< 0.150	U	< 0.150	U	ND or <QL	< 0.172	U	< 0.172	U	ND or <QL	< 0.124	U	< 0.124	U	ND or <QL	< 0.266	U	< 0.266	U	ND or <QL	< 0.181	U	< 0.181	U	ND or <QL
08A-0011-C1ET	< 0.133	U	< 0.133	U	ND or <QL	< 0.283	U	< 0.283	U	ND or <QL	< 0.166	U	< 0.166	U	ND or <QL	< 0.255	U	< 0.255	U	ND or <QL	< 0.188	U	< 0.188	U	ND or <QL
08A-0011-C1FS	4.6	J	4.6	J	ND or <QL	< 0.248	U	< 0.248	U	ND or <QL	< 0.140	U	< 0.140	U	ND or <QL	< 0.308	U	< 0.308	U	ND or <QL	< 0.208	U	< 0.208	U	ND or <QL
08A-0011-C1GS	< 0.0858	U	< 0.0858	U	ND or <QL	0.539	J	0.539	J	ND or <QL	< 0.0706	U	< 0.0706	U	ND or <QL	< 0.103	U	< 0.103	U	ND or <QL	0.32	J	0.32	J	ND or <QL
08A-0011-C1HS	< 0.755	U	< 0.755	U	ND or <QL	1.21	J	1.21	J	ND or <QL	< 0.0480	U	< 0.0480	U	ND or <QL	< 0.0846	U	< 0.0846	U	ND or <QL	< 0.0706	U	< 0.0706	U	ND or <QL
08A-0011-C1IS	< 0.152	U	< 0.152	U	ND or <QL	5.68	J	5.68	J	ND or <QL	< 0.142	U	< 0.142	U	ND or <QL	1.84	J	1.84	J	ND or <QL	< 0.258	U	< 0.258	U	ND or <QL
08A-0011-C1JS	< 0.0936	U	< 0.0936	U	ND or <QL	2.83	J	2.83	J	ND or <QL	< 0.118	U	< 0.118	U	ND or <QL	1.14	J	1.14	J	ND or <QL	< 0.123	U	< 0.123	U	ND or <QL
08A-0011-C1KS	< 0.179	U	< 0.179	U	ND or <QL	2.41	J	2.41	J	ND or <QL	< 0.151	U	< 0.151	U	ND or <QL	< 0.245	U	< 0.245	U	ND or <QL	< 0.149	U	< 0.149	U	ND or <QL
08A-0011-C1LS	< 0.121	U	< 0.121	U	ND or <QL	1.34	J	1.34	J	ND or <QL	< 0.153	U	< 0.153	U	ND or <QL	1.57	J	1.57	J	ND or <QL	< 0.219	U	< 0.219	U	ND or <QL
08A-0011-C1MS	< 0.0722	U	< 0.0722	U	ND or <QL	4.93	J	4.93	J	ND or <QL	< 0.112	U	< 0.112	U	ND or <QL	1.38	J	1.38	J	ND or <QL	< 0.171	U	< 0.171	U	ND or <QL
08A-0012-C1AS	314	J	314	J	None	18.3	J	18.3	J	ND or <QL	234	J	234	J	None	135	J	135	J	None	288	J	288	J	None
08A-0012-C1BS	191	J	191	J	None	7.84	J	7.84	J	ND or <QL	191	J	191	J	None	111	J	111	J	None	232	J	232	J	None
08A-0012-C1CS	116	J	116	J	None	6.28	J	6.28	J	ND or <QL	106	J	106	J	None	36	J	36	J	None	120	J	120	J	None
08A-0012-C1DS	547	J	547	J	None	55.4	J	55.4	J	None	559	J	559	J	None	243	J	243	J	None	611	J	611	J	None
08A-0012-C1ES	570	J	570	J	None	50.3	J	50.3	J	None	462	J	462	J	None	221	J	221	J	None	578	J	578	J	None
08A-0012-C1FS	212	J	212	J	None	27	J	27	J	None	218	J	218	J	None	117	J	117	J	None	317	J	317	J	None
08A-0012-C1FT	404	J	404	J	None	36.7	J	36.7	J	None	415	J	415	J	None	202	J	202	J	None	568	J	568	J	None
08A-0012-C1GS	675	J	675	J	None	109	J	109	J	None	611	J	611	J	None	761	J	761	J	None	769	J	769	J	None
08A-0012-C1HS	101	J	101	J	None	6.81	J	6.81	J	ND or <QL	129	J	129	J	None	44.1	J	44.1	J	None	134	J	134	J	None
08A-0012-C1IS	478		478		None	129		129		None	755		755		None	407		407		None	1370		1370		None
08A-0012-C1JS	354	J	354	J	None	50.8	J	50.8	J	None	477	J	477	J	None	235	J	235	J	None	564	J	564	J	None
08A-0013-C2AS	321	J	321	J	None	41.7	J	41.7	J	None	335	J	335	J	None	253	J	253	J	None	414	J	414	J	None
08A-0013-C2BS	655	J	655	J	None	28.8	J	28.8	J	None	438	J	438	J	None	273	J	273	J	None	471	J	471	J	None
08A-0013-C2CS	433	J	433	J	None	56.7	J	56.7	J	None	449	J	449	J	None	398	J	398	J	None	581	J	581	J	None
08A-0013-C2DS	491	J	491	J	None	41.4	J	41.4	J	None	407	J	407	J	None	268	J	268	J	None	575	J	575	J	None
08A-0013-C2ES	554	J	554	J	None	35.2	J	35.2	J	None	489	J	489	J	None	225	J	225	J	None	570	J	570	J	None
08A-0013-C2FS	711	J	711	J	None	70.9	J	70.9	J	None	655	J	655	J	None	290	J	290	J	None	692	J	692	J	None
08A-0013-C2FT	684	J	684	J	None	37.3	J	37.3	J	None	650	J	650	J	None	367	J	367	J	None	755	J	755	J	None
08A-0013-C2GS	525		525		None	64.4		64.4		None	490		490		None	218		218		None	719		719		None
08A-0013-C2GT	563		563		None	65.3		65.3		None	525		525		None	241		241		None	699		699		None
08A-0013-C2HS	822	J	822	J	None	120	J	120	J	None	933	J	933	J	None	466	J	466	J	None	1270	J	1270	J	None
08A-0013-C2IS	81.4		81.4		None	6.74	J	6.74	J	ND or <QL	92.7		92.7		None	71.3		71.3		None	119		119		None
08A-0013-C2JS	982	J	982	J	None	227	J	227	J	None	1510	J	1510	J	None	880	J	880	J	None	2490	J	2490	J	None
08A-0014-C1AS	212	J	212	J	None	9.64	J	9.64	J	ND or <QL	192	J	192	J	None	112	J	112	J	None	257	J	257	J	None
08A-0014-C1BS	663	J	663	J	None	51	J	51	J	None	393	J	393	J	None	245	J	245	J	None	635	J	635	J	None
08A-0014-C1CS	1020	J	1020	J	None	85	J	85	J	None	856	J	856	J	None	475	J	475	J	None	1070	J	1070	J	None
08A-0014-C1DS	959	J	959	J	None	171	J	171	J	None	1240	J	1240	J	None	907	J	907	J	None	1920	J	1920	J	None
08A-0014-C1ES	729	J	729	J	None	114	J	114	J	None	840	J	840	J	None	438	J	438	J	None	1230	J	1230	J	None
08A-0014-C1ET	164	J	164	J	None	11.1	J	11.1	J	ND or <QL	198	J	198	J	None	106	J	106	J	None	202	J	202	J	None
08A-0014-C1FS	312	J	312	J	None	98.6	J	98.6	J	None	500	J	500	J	None	935	J	935	J	None	1060	J	1060	J	None
08A-0014-C1GS	1180	J	1180	J	None	62.7	J	62.7	J	None	712	J	712	J	None	1290	J	1290	J	None	616	J	616	J	None
08A-0014-C1HS	46.7	J	46.7	J	None	< 0.482	UJ	< 0.482	UJ	ND or <QL	24	J	24	J	ND or <QL	2.78	J	2.78	J	ND or <QL	4.47	J	4.47	J	None
08A-0014-C1IS	18.4	J	18.4	J	ND or <QL	1.43	J	1.43	J	ND or <QL	12.8	J	12.8	J	ND or <QL	0.813	J	0.813	J	ND or <QL	10.7	J	10.7	J	None
08A-0014-C1JS	60.9	J	60.9	J	None	16.9	J	16.9	J	ND or <QL	57.8	J	57.8	J	None	27.1	J	27.1	J	None	123	J	123	J	None
08A-0014-C1KS	31.6		31.6		None	7.3	J	7.3	J	ND or <QL	34.9		34.9		None	14.9		14.9		None	69.4		69.4		None
08A-0014-C1LS	45		45		None	8.45	J	8.45	J	ND or <QL	47.8		47.8		None	11.2		11.2		None	74.1		74.1		None
08A-0014-C1MS	< 0.750	U	< 0.750	U	ND or <QL	< 0.231	U	< 0.231	U	ND or <QL	< 0.149	U	< 0.149	U	ND or <QL	< 0.292	U	< 0.292	U	ND or <QL	< 0.198	U	< 0.198	U	ND or <QL
08A-0014-C1NS	< 0.280	U	< 0.280	U	ND or <QL	< 0.0547	U	< 0.0547	U	ND or <QL	< 0.0455	U	< 0.0455	U	ND or <QL	< 0.0429	U	< 0.0429	U	ND or <QL	< 0.0464	U	< 0.0464	U	ND or <QL

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	Total HxCDF HxCDF ng/kg					Total PeCDD PeCDD ng/kg					Total PeCDF PeCDF ng/kg					Total TCDD TCDD ng/kg					Total TCDF TCDF ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0015-C2AS	373	J	373	J	None	31.6	J	31.6	J	ND or <QL	353	J	353	J	None	170	J	170	J	None	440	J	440	J	None
08A-0015-C2BS	239	J	239	J	None	17	J	17	J	ND or <QL	271	J	271	J	None	174	J	174	J	None	341	J	341	J	None
08A-0015-C2CS	464	J	464	J	None	50.7	J	50.7	J	None	464	J	464	J	None	299	J	299	J	None	767	J	767	J	None
08A-0015-C2DS	604	J	604	J	None	171	J	171	J	None	660	J	660	J	None	306	J	306	J	None	906	J	906	J	None
08A-0015-C2ES	444		444		None	42.8		42.8		None	633		633		None	187		187		None	902		902		None
08A-0015-C2FS	606		606		None	50.6		50.6		None	1530		1530		None	518		518		None	2760		2760		None
08A-0015-C2GS	46.4		46.4		None	16.5	J	16.5	J	ND or <QL	105		105		None	117		117		None	168		168		None
08A-0015-C2HS	< 0.0839	U	< 0.0839	U	ND or <QL	< 0.111	U	< 0.111	U	ND or <QL	< 0.0593	U	< 0.0593	U	ND or <QL	< 0.0773	U	< 0.0773	U	ND or <QL	0.456	J	0.456	J	ND or <QL
08A-0015-C2IS	< 0.199	U	< 0.199	U	ND or <QL	< 0.283	U	< 0.283	U	ND or <QL	< 0.241	U	< 0.241	U	ND or <QL	< 0.393	U	< 0.393	U	ND or <QL	< 0.253	U	< 0.253	U	ND or <QL
08A-0015-C2JS	< 0.125	U	< 0.125	U	ND or <QL	< 0.213	U	< 0.213	U	ND or <QL	< 0.169	U	< 0.169	U	ND or <QL	1.34	J	1.34	J	ND or <QL	< 0.255	U	< 0.255	U	ND or <QL
08A-0016-C1AS	202	J	202	J	None	12.4	J	12.4	J	ND or <QL	188	J	188	J	None	130	J	130	J	None	220	J	220	J	None
08A-0016-C1BS	498	J	498	J	None	42.4	J	42.4	J	None	416	J	416	J	None	283	J	283	J	None	484	J	484	J	None
08A-0016-C1CS	356	J	356	J	None	30	J	30	J	None	397	J	397	J	None	1310	J	1310	J	None	465	J	465	J	None
08A-0016-C1DS	379	J	379	J	None	32.8	J	32.8	J	ND or <QL	442	J	442	J	None	325	J	325	J	None	484	J	484	J	None
08A-0016-C1ES	567	J	567	J	None	68.5	J	68.5	J	None	484	J	484	J	None	297	J	297	J	None	568	J	568	J	None
08A-0016-C1ET	537	J	537	J	None	42.8	J	42.8	J	None	481	J	481	J	None	326	J	326	J	None	601	J	601	J	None
08A-0016-C1FS	556	J	556	J	None	57.9	J	57.9	J	None	524	J	524	J	None	276	J	276	J	None	632	J	632	J	None
08A-0016-C1GS	803	J	803	J	None	86.2	J	86.2	J	None	676	J	676	J	None	356	J	356	J	None	700	J	700	J	None
08A-0016-C1HS	119	J	119	J	None	8.37	J	8.37	J	ND or <QL	118	J	118	J	None	55.8	J	55.8	J	None	119	J	119	J	None
08A-0016-C1IS	892	J	892	J	None	89.9	J	89.9	J	None	800	J	800	J	None	614	J	614	J	None	1040	J	1040	J	None
08A-0016-C1JS	675	J	675	J	None	88.7	J	88.7	J	None	1070	J	1070	J	None	853	J	853	J	None	1600	J	1600	J	None
08A-0016-C1KS	1090	J	1090	J	None	192	J	192	J	None	1770	J	1770	J	None	1820	J	1820	J	None	2890	J	2890	J	None
08A-0016-C1LS	1260	J	1260	J	None	152	J	152	J	None	1970	J	1970	J	None	1460	J	1460	J	None	3330	J	3330	J	None
08A-0017-C1AS	537	J	537	J	None	62.3	J	62.3	J	None	493	J	493	J	None	311	J	311	J	None	635	J	635	J	None
08A-0017-C1AT	545	J	545	J	None	39.8	J	39.8	J	None	495	J	495	J	None	282	J	282	J	None	623	J	623	J	None
08A-0017-C1BS	717	J	849	B	Split-Replaced	61.4	J	89.4		Split-Replaced	587	J	679	B	Split-Replaced	303	J	410	B	Split-Replaced	709	J	785	B	Split-Replaced
08A-0017-C1CS	1080	J	1080	J	None	65.5	J	65.5	J	None	942	J	942	J	None	407	J	407	J	None	1030	J	1030	J	None
08A-0017-C1DS	1050	J	1130	B	Split-Replaced	314	J	91.4		Split-Replaced	783	J	818	B	Split-Replaced	312	J	397	B	Split-Replaced	787	J	921	B	Split-Replaced
08A-0017-C1ES	1090	J	1090	J	None	94.3	J	94.3	J	None	814	J	814	J	None	374	J	374	J	None	824	J	824	J	None
08A-0017-C1FS	1700	J	1700	J	None	122	J	122	J	None	1350	J	1350	J	None	804	J	804	J	None	1650	J	1650	J	None
08A-0017-C1GS	1120	J	1120	J	None	70.7	J	70.7	J	None	1040	J	1040	J	None	629	J	629	J	None	1360	J	1360	J	None
08A-0017-C1HS	1930	J	1930	J	None	239	J	239	J	None	2850	J	2850	J	None	2390	J	2390	J	None	4340	J	4340	J	None
08A-0017-C1IS	2690	J	2690	J	None	314	J	314	J	None	3650	J	3650	J	None	3700	J	3700	J	None	6710	J	6710	J	None
08A-0017-C1JS	1690	J	1690	J	None	181	J	181	J	None	2170	J	2170	J	None	2240	J	2240	J	None	3780	J	3780	J	None
08A-0017-C1KS	28.4		28.4		None	8.88	J	8.88	J	ND or <QL	38.8		38.8		None	11.4		11.4		None	63.3		63.3		None
08A-0017-C1LS	12.9	J	12.9	J	ND or <QL	< 0.273	U	< 0.273	U	ND or <QL	< 0.196	U	< 0.196	U	ND or <QL	< 0.310	U	< 0.310	U	ND or <QL	1.96	J	1.96	J	ND or <QL
08A-0017-C1MS	67.6		67.6		None	12.8	J	12.8	J	ND or <QL	62.6		62.6		None	22.2		22.2		None	128		128		None
08A-0017-C1NS	< 4.15	U	< 4.15	U	ND or <QL	< 0.0657	U	< 0.0657	U	ND or <QL	5.33	J	5.33	J	ND or <QL	4.83		4.83		None	6.72		6.72		None
08A-0017-C1OS	< 0.452	U	< 0.452	U	ND or <QL	< 0.0751	U	< 0.0751	U	ND or <QL	< 0.158	U	< 0.158	U	ND or <QL	< 0.0473	U	< 0.0473	U	ND or <QL	0.418	J	0.418	J	ND or <QL
08A-0018-C1AS	790	J	790	J	None	35.4	J	35.4	J	None	1070	J	1070	J	None	158	J	158	J	None	1240	J	1240	J	None
08A-0018-C1BS	131	J	131	J	None	12.3	J	12.3	J	ND or <QL	191	J	191	J	None	97.6	J	97.6	J	None	240	J	240	J	None
08A-0018-C1CS	94.9	J	94.9	J	None	9.35	J	9.35	J	ND or <QL	106	J	106	J	None	37.2	J	37.2	J	None	133	J	133	J	None
08A-0018-C1DS	289	J	289	J	None	20.6	J	20.6	J	ND or <QL	537	J	537	J	None	107	J	107	J	None	763	J	763	J	None
08A-0018-C1ES	1230	J	1230	J	None	222	J	222	J	None	2720	J	2720	J	None	1630	J	1630	J	None	3740	J	3740	J	None
08A-0018-C1FS	1010		1010		None	371		371		None	1950		1950		None	429		429		None	777		777		None
08A-0018-C1GS	28		28		None	5.82	J	5.82	J	ND or <QL	22.4		22.4		None	3.57		3.57		None	19.4		19.4		None
08A-0018-C1HS	< 0.322	U	< 0.322	U	ND or <QL	< 0.0843	U	< 0.0843	U	ND or <QL	< 0.148	U	< 0.148	U	ND or <QL	< 0.0725	U	< 0.0725	U	ND or <QL	< 0.0539	U	< 0.0539	U	ND or <QL
08A-0018-C1IS	< 0.156	U	< 0.156	U	ND or <QL	< 0.0548	U	< 0.0548	U	ND or <QL	< 0.0291	U	< 0.0291	U	ND or <QL	< 0.0478	U	< 0.0478	U	ND or <QL	< 0.128	U	< 0.128	U	ND or <QL
08A-0019-C3AS	393	J	393	J	None	37.8	J	37.8	J	ND or <QL	419	J	419	J	None	338	J	338	J	None	697	J	697	J	None
08A-0019-C3BS	621	J	660	B	Split-Replaced	84.7	J	101		Split-Replaced	603	J	662	B	Split-Replaced	444	J	481		Split-Replaced	809	J	813		Split-Replaced
08A-0019-C3CS	656	J	1340	B	Split-Replaced	132	J	233		Split-Replaced	934	J	1600	B	Split-Replaced	586	J	1150		Split-Replaced	1330	J	1980		Split-Replaced
08A-0019-C3DS	751	J	1270		Split-Replaced	210	J	224		Split-Replaced	1430	J	1530		Split-Replaced	582	J	882		Split-Replaced	1770	J	1920		Split-Replaced
08A-0019-C3ES	48.3	J	48.3	J	None	3.77	J	3.77	J	ND or <QL	72.3	J	72.3	J	None	17.9	J	17.9	J	None	77.3	J	77.3	J	None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	Total HxCDF HXCDF ng/kg					Total PeCDD PECDD ng/kg					Total PeCDF PECDF ng/kg					Total TCDD TCDD ng/kg					Total TCDF TCDF ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0019-D1AS	388	J	388	J	None	39.1	J	39.1	J	ND or <QL	503	J	503	J	None	349	J	349	J	None	643	J	643	J	None
08A-0019-D1BS	322	J	322	J	None	37.9	J	37.9	J	None	361	J	361	J	None	236	J	236	J	None	468	J	468	J	None
08A-0019-D1CS	388	J	388	J	None	23.7	J	23.7	J	ND or <QL	363	J	363	J	None	228	J	228	J	None	515	J	515	J	None
08A-0019-D1DS	477	J	477	J	None	50.5	J	50.5	J	None	426	J	426	J	None	246	J	246	J	None	523	J	523	J	None
08A-0019-D1ES	704	J	704	J	None	131	J	131	J	None	990	J	990	J	None	636	J	636	J	None	1440	J	1440	J	None
08A-0020-C2AS	316	J	316	J	None	31.5	J	31.5	J	ND or <QL	335	J	335	J	None	198	J	198	J	None	317	J	317	J	None
08A-0020-C2BS	616	J	616	J	None	48	J	48	J	None	540	J	540	J	None	276	J	276	J	None	540	J	540	J	None
08A-0020-C2BT	234	J	234	J	None	12	J	12	J	ND or <QL	213	J	213	J	None	93.5	J	93.5	J	None	221	J	221	J	None
08A-0020-C2CS	685	J	1610	B	Split-Replaced	70.3	J	169		Split-Replaced	688	J	1360	B	Split-Replaced	222	J	509	B	Split-Replaced	663	J	1410	B	Split-Replaced
08A-0020-C2DS	581	J	2660	B	Split-Replaced	59.3	J	354		Split-Replaced	1010	J	3580	B	Split-Replaced	349	J	1640	B	Split-Replaced	1160	J	4160	B	Split-Replaced
08A-0020-C2ES	1350	J	3940	B	Split-Replaced	159	J	495		Split-Replaced	2510	J	5290	B	Split-Replaced	3080	J	7120	B	Split-Replaced	4880	J	9890	B	Split-Replaced
08A-0020-C2FS	972	J	972	J	None	194	J	194	J	None	1040	J	1040	J	None	1750	J	1750	J	None	989	J	989	J	None
08A-0020-C2FT	2600	J	2600	J	None	325	J	325	J	None	3130	J	3130	J	None	4280	J	4280	J	None	2840	J	2840	J	None
08A-0020-C2GS	119	J	119	J	None	11.5	J	11.5	J	ND or <QL	136	J	136	J	None	23.1	J	23.1	J	None	106	J	106	J	None
08A-0020-C2HS	12.6	J	12.6	J	ND or <QL	4.5	J	4.5	J	ND or <QL	14.9	J	14.9	J	ND or <QL	6.51		6.51		None	26.9		26.9		None
08A-0021-C1AS	483	J	483	J	None	57.6	J	57.6	J	None	429	J	429	J	None	396	J	396	J	None	623	J	623	J	None
08A-0021-C1BS	561		561		None	41.3		41.3		None	531		531		None	207		207		None	619		619		None
08A-0021-C1CS	757		757		None	71.4		71.4		None	801		801		None	633		633		None	1200		1200		None
08A-0021-C1DS	1270	J	1270	J	None	189	J	189	J	None	1820	J	1820	J	None	2080	J	2080	J	None	3520	J	3520	J	None
08A-0021-C1ES	3020	J	3020	J	None	661	J	661	J	None	6320	J	6320	J	None	129000	J	129000	J	None	17000	J	17000	J	None
08A-0021-C1FS	9790	J	9790	J	None	1190	J	1190	J	None	7500	J	7500	J	None	35800	J	35800	J	None	15900	J	15900	J	None
08A-0021-C1FT	6840	J	6840	J	None	869	J	869	J	None	9640	J	9640	J	None	42700	J	42700	J	None	19400	J	19400	J	None
08A-0021-C1GS	5320	J	5320	J	None	9400	J	9400	J	None	3770	J	3770	J	None	18900	J	18900	J	None	3230	J	3230	J	None
08A-0021-C1HS	994		994		None	50.1		50.1		None	1100		1100		None	40.9		40.9		None	432		432		None
08A-0022-C1AS	607	J	607	J	None	46.8	J	46.8	J	None	535	J	535	J	None	808	J	808	J	None	637	J	637	J	None
08A-0022-C1BS	1370	J	1370	J	None	101	J	101	J	None	1070	J	1070	J	None	428	J	428	J	None	945	J	945	J	None
08A-0022-C1CS	1760	J	1760	J	None	352	J	352	J	None	6340	J	6340	J	None	1940	J	1940	J	None	8060	J	8060	J	None
08A-0022-C1DS	2110		2110		None	204		204		None	2930		2930		None	5180		5180		None	5700		5700		None
08A-0022-C1ES	13.1	J	13.1	J	ND or <QL	5.28	J	5.28	J	ND or <QL	21.9		21.9		None	7.8		7.8		None	33.4		33.4		None
08A-0022-C1FS	< 3.17	U	< 3.17	U	ND or <QL	5.79	J	5.79	J	ND or <QL	1.35	J	1.35	J	ND or <QL	0.255	J	0.255	J	ND or <QL	1.59	J	1.59	J	ND or <QL
08A-0022-C1GS	< 0.805	U	< 0.805	U	ND or <QL	6.36	J	6.36	J	ND or <QL	< 0.0648	U	< 0.0648	U	ND or <QL	2.52	J	2.52	J	ND or <QL	0.882	J	0.882	J	ND or <QL
08A-0022-C1HS	11.4	J	11.4	J	ND or <QL	8.36	J	8.36	J	ND or <QL	3.75	J	3.75	J	ND or <QL	1.88		1.88		None	1.18	J	1.18	J	ND or <QL
08A-0022-C1IS	< 0.685	U	< 0.685	U	ND or <QL	4.74	J	4.74	J	ND or <QL	< 0.0706	U	< 0.0706	U	ND or <QL	2.72		2.72		None	0.678	J	0.678	J	ND or <QL
08A-0022-C1JS	< 0.346	U	< 0.346	U	ND or <QL	0.649	J	0.649	J	ND or <QL	< 0.0754	U	< 0.0754	U	ND or <QL	< 0.106	U	< 0.106	U	ND or <QL	0.711	J	0.711	J	ND or <QL
08A-0022-D2AS	610	J	610	J	None	47	J	47	J	None	567	J	567	J	None	315	J	315	J	None	683	J	683	J	None
08A-0022-D2BS	208	J	208	J	None	9.79	J	9.79	J	ND or <QL	201	J	201	J	None	139	J	139	J	None	261	J	261	J	None
08A-0022-D2CS	418	J	418	J	None	45.7	J	45.7	J	None	459	J	459	J	None	242	J	242	J	None	418	J	418	J	None
08A-0022-D2DS	1150	J	1150	J	None	49.8	J	49.8	J	None	1050	J	1050	J	None	547	J	547	J	None	1110	J	1110	J	None
08A-0022-D2ES	3030	J	3030	J	None	134	J	134	J	None	2820	J	2820	J	None	606	J	606	J	None	2910	J	2910	J	None
08A-0023-C2AS	284	J	284	J	None	45.7	J	45.7	J	ND or <QL	339	J	339	J	None	236	J	236	J	None	394	J	394	J	None
08A-0023-C2BS	595	J	595	J	None	76	J	76	J	None	544	J	544	J	None	366	J	366	J	None	674	J	674	J	None
08A-0023-C2CS	662	J	662	J	None	113	J	113	J	None	677	J	677	J	None	744	J	744	J	None	920	J	920	J	None
08A-0023-C2DS	674	J	674	J	None	151	J	151	J	None	935	J	935	J	None	582	J	582	J	None	1250	J	1250	J	None
08A-0023-C2ES	1090	J	1090	J	None	165	J	165	J	None	1610	J	1610	J	None	2300	J	2300	J	None	2690	J	2690	J	None
08A-0023-C2FS	947	J	947	J	None	161	J	161	J	None	3020	J	3020	J	None	6980	J	6980	J	None	6820	J	6820	J	None
08A-0023-C2GS	1920	J	1920	J	None	81.8	J	81.8	J	None	3210	J	3210	J	None	11900	J	11900	J	None	5650	J	5650	J	None
08A-0023-C2HS	4820	J	4820	J	None	2950	J	2950	J	None	13000	J	13000	J	None	85900	J	85900	J	None	11100	J	11100	J	None
08A-0023-C2IS	1660	J	1660	J	None	902	J	902	J	None	1830	J	1830	J	None	21600	J	21600	J	None	1380	J	1380	J	None
08A-0023-C2JS	73.9		73.9		None	15	J	15	J	ND or <QL	86.1		86.1		None	14.1		14.1		None	90.9		90.9		None
08A-0024-C1AS	554	J	554	J	None	36.8	J	36.8	J	ND or <QL	658	J	658	J	None	527	J	527	J	None	752	J	752	J	None
08A-0024-C1BS	996	J	996	J	None	110	J	110	J	None	2060	J	2060	J	None	2450	J	2450	J	None	3060	J	3060	J	None
08A-0024-C1CS	1870	J	1870	J	None	266	J	266	J	None	4090	J	4090	J	None	10300	J	10300	J	None	7850	J	7850	J	None
08A-0024-C1DS	3340	J	3340	J	None	375	J	375	J	None	4530	J	4530	J	None	4450	J	4450	J	None	8140	J	8140	J	None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	Total HxCDF HXCDF ng/kg					Total PeCDD PECDD ng/kg					Total PeCDF PECDF ng/kg					Total TCDD TCDD ng/kg					Total TCDF TCDF ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0024-C1ES	3500	J	3500	J	None	675	J	675	J	None	5850	J	5850	J	None	17100	J	17100	J	None	7710	J	7710	J	None
08A-0024-C1FS	4530	J	4530	J	None	869	J	869	J	None	4420	J	4420	J	None	11500	J	11500	J	None	4480	J	4480	J	None
08A-0024-C1FT	4380	J	4380	J	None	949	J	949	J	None	4640	J	4640	J	None	36600	J	36600	J	None	4630	J	4630	J	None
08A-0024-C1GS	322		322		None	23.5	J	23.5	J	ND or <QL	366		366		None	64.4		64.4		None	236		236		None
08A-0024-C1HS	28		28		None	6.69	J	6.69	J	ND or <QL	31.8		31.8		None	24.1		24.1		None	37.9		37.9		None
08A-0025-C1AS	57.9	J	57.9	J	None	126	J	126	J	None	56.5	J	56.5	J	None	35.2	J	35.2	J	None	60.8	J	60.8	J	None
08A-0025-C1BS	88.6	J	88.6	J	None	4.65	J	4.65	J	ND or <QL	96.8	J	96.8	J	None	63.4	J	63.4	J	None	112	J	112	J	None
08A-0025-C1CS	165	J	165	J	None	36.1	J	36.1	J	None	263	J	263	J	None	297	J	297	J	None	317	J	317	J	None
08A-0025-C1DS	339		339		None	37.3		37.3		None	556		556		None	891		891		None	771		771		None
08A-0025-C1ES	1420	J	1420	J	None	170	J	170	J	None	3600	J	3600	J	None	5210	J	5210	J	None	6470	J	6470	J	None
08A-0025-C1ET	1500	J	1500	J	None	249	J	249	J	None	2050	J	2050	J	None	5290	J	5290	J	None	6140	J	6140	J	None
08A-0025-C1FS	2910	J	2910	J	None	1240	J	1240	J	None	5530	J	5530	J	None	10500	J	10500	J	None	6350	J	6350	J	None
08A-0025-C1GS	131		131		None	29		29		None	126		126		None	15.2		15.2		None	13.8		13.8		None
08A-0026-C1AS	431	J	431	J	None	34.1	J	34.1	J	ND or <QL	415	J	415	J	None	266	J	266	J	None	430	J	430	J	None
08A-0026-C1BS	1260	J	1260	J	None	106	J	106	J	None	925	J	925	J	None	456	J	456	J	None	1090	J	1090	J	None
08A-0026-C1CS	126	J	126	J	None	18.2	J	18.2	J	ND or <QL	183	J	183	J	None	86.7	J	86.7	J	None	262	J	262	J	None
08A-0026-C1DS	2.06	J	2.06	J	ND or <QL	< 0.0913	U	< 0.0913	U	ND or <QL	0.216	J	0.216	J	ND or <QL	0.105	J	0.105	J	ND or <QL	0.491	J	0.491	J	ND or <QL
08A-0026-C1ES	< 0.207	U	0.708	BJ	Split-Replaced	0.861	J	7.71	BJ	Split-Replaced	< 0.0283	U	0.515	BJ	Split-Replaced	0.854	J	4.48	Split-Replaced	0.638	J	1.79	Split-Replaced		
08A-0027-C1AS	138	J	138	J	None	21.1	J	21.1	J	ND or <QL	148	J	148	J	None	97.6	J	97.6	J	None	181	J	181	J	None
08A-0027-C1BS	175	J	175	J	None	14.5	J	14.5	J	ND or <QL	180	J	180	J	None	120	J	120	J	None	208	J	208	J	None
08A-0027-C1CS	136	J	136	J	None	9.3	J	9.3	J	ND or <QL	124	J	124	J	None	67.8	J	67.8	J	None	124	J	124	J	None
08A-0027-C1DS	724	J	724	J	None	57.6	J	57.6	J	None	792	J	792	J	None	440	J	440	J	None	871	J	871	J	None
08A-0027-C1ES	211	J	211	J	None	33.8	J	33.8	J	None	256	J	256	J	None	127	J	127	J	None	259	J	259	J	None
08A-0027-C1FS	771	J	771	J	None	236	J	236	J	None	1100	J	1100	J	None	497	J	497	J	None	1440	J	1440	J	None
08A-0027-C1GS	1520		1520		None	222		222		None	3050		3050		None	8390		8390		None	5610		5610		None
08A-0027-C1HS	704	J	704	J	None	84.1	J	84.1	J	None	1770	J	1770	J	None	2250	J	2250	J	None	3560	J	3560	J	None
08A-0027-C1IS	998		998		None	238		238		None	1830		1830		None	4320		4320		None	3470		3470		None
08A-0028-C2AS	475	J	475	J	None	46.1	J	46.1	J	ND or <QL	390	J	390	J	None	243	J	243	J	None	382	J	382	J	None
08A-0028-C2BS	333	J	333	J	None	29.6	J	29.6	J	ND or <QL	389	J	389	J	None	263	J	263	J	None	421	J	421	J	None
08A-0028-C2CS	520	J	520	J	None	63.5	J	63.5	J	None	528	J	528	J	None	405	J	405	J	None	686	J	686	J	None
08A-0028-C2DS	423	J	423	J	None	48.1	J	48.1	J	None	509	J	509	J	None	275	J	275	J	None	528	J	528	J	None
08A-0028-C2ES	936	J	936	J	None	141	J	141	J	None	1570	J	1570	J	None	1490	J	1490	J	None	1500	J	1500	J	None
08A-0028-C2FS	3940	J	3940	J	None	739	J	739	J	None	3960	J	3960	J	None	15200	J	15200	J	None	9680	J	9680	J	None
08A-0028-C2GS	52.5		52.5		None	14.8	J	14.8	J	ND or <QL	63.8		63.8		None	42.5		42.5		None	116		116		None
08A-0028-D1AS	226		226		None	22.1	J	22.1	J	ND or <QL	251		251		None	273		273		None	347		347		None
08A-0028-D1BS	512	J	512	J	None	43.4	J	43.4	J	ND or <QL	461	J	461	J	None	304	J	304	J	None	481	J	481	J	None
08A-0028-D1CS	575	J	575	J	None	76.4	J	76.4	J	None	513	J	513	J	None	459	J	459	J	None	661	J	661	J	None
08A-0028-D1DS	323	J	323	J	None	40	J	40	J	None	324	J	324	J	None	248	J	248	J	None	388	J	388	J	None
08A-0028-D1DT	542	J	542	J	None	70.6	J	70.6	J	None	514	J	514	J	None	363	J	363	J	None	607	J	607	J	None
08A-0028-D1ES	307	J	307	J	None	44.8	J	44.8	J	None	291	J	291	J	None	593	J	593	J	None	312	J	312	J	None
08A-0029-C1AS	308	J	308	J	None	25.2	J	25.2	J	ND or <QL	529	J	529	J	None	627	J	627	J	None	804	J	804	J	None
08A-0029-C1AT	619	J	619	J	None	108	J	108	J	None	1450	J	1450	J	None	1810	J	1810	J	None	2410	J	2410	J	None
08A-0029-C1BS	1360	J	1360	J	None	409	J	409	J	None	2890	J	2890	J	None	8320	J	8320	J	None	4620	J	4620	J	None
08A-0029-C1CS	851	J	851	J	None	373	J	373	J	None	2020	J	2020	J	None	8550	J	8550	J	None	4910	J	4910	J	None
08A-0029-C1CT	1310	J	1310	J	None	913	J	913	J	None	4900	J	4900	J	None	22900	J	22900	J	None	8340	J	8340	J	None
08A-0029-C1DS	1050		1050		None	761		761		None	2410		2410		None	10100	J	10100	J	None	3390	J	3390	J	None
08A-0029-C1ES	1350		1350		None	240		240		None	1870		1870		None	3290		3290		None	1060		1060		None
08A-0029-C1FS	1770		1770		None	257		257		None	3540		3540		None	1990		1990		None	1740		1740		None
08A-0029-C1GS	49.1		49.1		None	29.3		29.3		None	67.3		67.3		None	15.5		15.5		None	55.7		55.7		None
08A-0030-C1AS	362	J	362	J	None	48.4	J	48.4	J	ND or <QL	456	J	456	J	None	561	J	561	J	None	492	J	492	J	None
08A-0030-C1BS	765	J	765	J	None	130	J	130	J	None	904	J	904	J	None	665	J	665	J	None	1090	J	1090	J	None
08A-0030-C1CS	1470	J	1470	J	None	139	J	139	J	None	3020	J	3020	J	None	10300	J	10300	J	None	5490	J	5490	J	None
08A-0030-C1DS	1380	J	1380	J	None	743	J	743	J	None	4900	J	4900	J	None	11200	J	11200	J	None	8430	J	8430	J	None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	Total HxCDF HxCDF ng/kg					Total PeCDD PeCDD ng/kg					Total PeCDF PeCDF ng/kg					Total TCDD TCDD ng/kg					Total TCDF TCDF ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0030-C1ES	639	J	639	J	None	197	J	197	J	None	2590	J	2590	J	None	4440	J	4440	J	None	6130	J	6130	J	None
08A-0030-C1FS	180		180		None	10.1	J	10.1	J	ND or <QL	166		166		None	588		588		None	162		162		None
08A-0030-C1GS	0.538	J	0.538	J	ND or <QL	< 0.305	U	< 0.305	U	ND or <QL	0.27	J	0.27	J	ND or <QL	< 0.206	U	< 0.206	U	ND or <QL	1.47		1.47		None
08A-0031-C1AS	345	J	345	J	None	70.4	J	70.4	J	ND or <QL	326	J	326	J	None	285	J	285	J	None	471	J	471	J	None
08A-0031-C1BS	695	J	695	J	None	134	J	134	J	None	882	J	882	J	None	799	J	799	J	None	1270	J	1270	J	None
08A-0031-C1CS	255	J	255	J	None	43	J	43	J	ND or <QL	514	J	514	J	None	520	J	520	J	None	805	J	805	J	None
08A-0031-C1DS	1980	J	1980	J	None	713	J	713	J	None	5090	J	5090	J	None	7240	J	7240	J	None	6590	J	6590	J	None
08A-0031-C1ES	279		279		None	39.6		39.6		None	195		195		None	33		33		None	117		117		None
08A-0031-C1FS	< 0.183	U	< 0.183	U	ND or <QL	< 0.295	U	< 0.295	U	ND or <QL	< 0.155	U	< 0.155	U	ND or <QL	< 0.212	U	< 0.212	U	ND or <QL	1.17	J	1.17	J	ND or <QL
08A-0032-C2AS	149	J	149	J	None	22.2	J	22.2	J	ND or <QL	189	J	189	J	None	123	J	123	J	None	172	J	172	J	None
08A-0032-C2BS	354	J	354	J	None	25.9	J	25.9	J	ND or <QL	332	J	332	J	None	280	J	280	J	None	395	J	395	J	None
08A-0032-C2CS	792	J	792	J	None	117	J	117	J	None	741	J	741	J	None	568	J	568	J	None	867	J	867	J	None
08A-0032-C2DS	905	J	905	J	None	209	J	209	J	None	3200	J	3200	J	None	4430	J	4430	J	None	5870	J	5870	J	None
08A-0032-C2ES	6850	J	6850	J	None	573	J	573	J	None	8490	J	8490	J	None	7410	J	7410	J	None	6500	J	6500	J	None
08A-0032-C2FS	317	J	317	J	None	77.6	J	77.6	J	None	663	J	663	J	None	1230	J	1230	J	None	1150	J	1150	J	None
08A-0032-C2GS	474		474		None	97.1		97.1		None	806		806		None	2300		2300		None	458		458		None
08A-0032-C2HS	305		305		None	15.4	J	15.4	J	ND or <QL	309		309		None	7.06		7.06		None	135		135		None
08A-0032-C2IS	44		44		None	3.03	J	3.03	J	ND or <QL	36.5		36.5		None	10.7		10.7		None	15		15		None
08A-0033-C1AS	372	J	372	J	None	31.9	J	31.9	J	ND or <QL	339	J	339	J	None	241	J	241	J	None	402	J	402	J	None
08A-0033-C1BS	584	J	584	J	None	46.1	J	46.1	J	None	512	J	512	J	None	312	J	312	J	None	592	J	592	J	None
08A-0033-C1CS	383	J	383	J	None	45.8	J	45.8	J	None	381	J	381	J	None	216	J	216	J	None	428	J	428	J	None
08A-0033-C1DS	1230	J	1230	J	None	121	J	121	J	None	1090	J	1090	J	None	714	J	714	J	None	1240	J	1240	J	None
08A-0033-C1ES	334	J	334	J	None	62.8	J	62.8	J	None	524	J	524	J	None	697	J	697	J	None	512	J	512	J	None
08A-0033-C1ET	101	J	101	J	None	15.8	J	15.8	J	ND or <QL	169	J	169	J	None	272	J	272	J	None	215	J	215	J	None
08A-0034-C1AS	164		164		None	19.7		19.7		None	166		166		None	133		133		None	249		249		None
08A-0034-C1BS	332		332		None	42		42		None	332		332		None	431		431		None	418		418		None
08A-0034-C1CS	538		538		None	106		106		None	829		829		None	1040		1040		None	1380		1380		None
08A-0034-D2AS	162		162		None	23.2	J	23.2	J	ND or <QL	193		193		None	160		160		None	236		236		None
08A-0034-D2BS	65.3		65.3		None	5.7	J	5.7	J	ND or <QL	110		110		None	87		87		None	128		128		None
08A-0034-D2CS	169		169		None	32.1		32.1		None	261		261		None	191		191		None	310		310		None
08A-0034-D2DS	261		261		None	33.9		33.9		None	283		283		None	178		178		None	350		350		None
08A-0034-D2ES	211		211		None	34.9		34.9		None	277		277		None	219		219		None	445		445		None
08A-0035-C5AS	15.9	J	15.9	J	ND or <QL	0.535	J	0.535	J	ND or <QL	36.7		36.7		None	9.35		9.35		None	53.6		53.6		None
08A-0036-C2AS	89.7		89.7		None	10.7	J	10.7	J	ND or <QL	128		128		None	102		102		None	166		166		None
08A-0036-C2BS	58.8		58.8		None	16.4		16.4		None	76.8		76.8		None	41.8		41.8		None	34.8		34.8		None
08A-0036-C2CS	447		447		None	82.4		82.4		None	1040		1040		None	1360		1360		None	1920		1920		None
08A-0036-C2DS	491		491		None	83.8		83.8		None	981		981		None	1040		1040		None	1380		1380		None
08A-0036-C2ES	846		846		None	141		141		None	2040		2040		None	3230		3230		None	3280		3280		None
08A-0036-C2ET	995		995		None	149		149		None	2020		2020		None	2830		2830		None	3670		3670		None
08A-0036-C2FS	840		840		None	79		79		None	1890		1890		None	2210		2210		None	3270		3270		None
08A-0036-C2GS	1310		1310		None	252		252		None	1640		1640		None	47500		47500		None	3090		3090		None
08A-0037-C1AS	200		200		None	35		35		None	249		249		None	184		184		None	304		304		None
08A-0037-C1BS	205	J	205	J	None	37.7	J	37.7	J	None	254	J	254	J	None	166	J	166	J	None	263	J	263	J	None
08A-0037-C1CS	217		217		None	40.2		40.2		None	456		456		None	412		412		None	625		625		None
08A-0037-C1DS	176		176		None	22.7		22.7		None	426		426		None	422		422		None	541		541		None
08A-0037-C1ES	208		208		None	17.3	J	17.3	J	ND or <QL	445		445		None	637		637		None	734		734		None
08A-0038-C1AS	198		198		None	26		26		None	189		189		None	152		152		None	224		224		None
08A-0038-C1BS	275		275		None	28.9	J	28.9	J	ND or <QL	400		400		None	361		361		None	569		569		None
08A-0038-C1CS	408		408		None	55.2		55.2		None	712		712		None	862		862		None	1160		1160		None
08A-0038-C1DS	439	J	439	J	None	114	J	114	J	None	679	J	679	J	None	813	J	813	J	None	1180	J	1180	J	None
08A-0038-C1ES	857		958	B	Split-Replaced	95.6		172		Split-Replaced	1660		1640	B	Split-Replaced	2100		2670	B	Split-Replaced	3270		2810	B	Split-Replaced
08A-0038-C2FS	548		548		None	145		145		None	2120		2120		None	1490		1490		None	3350		3350		None
08A-0038-C2GS	259		259		None	52.5		52.5		None	492		492		None	1100		1100		None	310		310		None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	Total HxCDF HxCDF ng/kg					Total PeCDD PeCDD ng/kg					Total PeCDF PeCDF ng/kg					Total TCDD TCDD ng/kg					Total TCDF TCDF ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0039-C1AS	237		237		None	19.9	J	19.9	J	ND or <QL	284		284		None	175		175		None	319		319		None
08A-0039-C1BS	296	J	296	J	None	33.5	J	33.5	J	None	324	J	324	J	None	192	J	192	J	None	376	J	376	J	None
08A-0039-C1CS	317		317		None	27.9		27.9		None	341		341		None	236		236		None	387		387		None
08A-0039-C1DS	396		396		None	67.3		67.3		None	789		789		None	704		704		None	1090		1090		None
08A-0039-C1ES	433		433		None	71		71		None	946		946		None	819		819		None	1460		1460		None
08A-0039-C1FS	1080	J	1080	J	None	357	J	357	J	None	2650	J	2650	J	None	3180	J	3180	J	None	5120	J	5120	J	None
08A-0039-C1GS	1390		1390		None	154		154		None	1540		1540		None	1250		1250		None	903		903		None
08A-0039-C1HS	1070	J	1070	J	None	144	J	144	J	None	2070	J	2070	J	None	1610	J	1610	J	None	1270	J	1270	J	None
08A-0040-C1AS	572		572		None	75.1		75.1		None	753		753		None	869		869		None	1930		1930		None
08A-0040-C1BS	1750		1750		None	294		294		None	3380		3380		None	4930		4930		None	5180		5180		None
08A-0040-C1CS	1970		1970		None	474		474		None	3240		3240		None	21600		21600		None	5100		5100		None
08A-0040-C1CT	1260		1260		None	526		526		None	3030		3030		None	17200		17200		None	4610		4610		None
08A-0040-C1DS	1390		1390		None	178		178		None	1670		1670		None	2690		2690		None	771		771		None
08A-0040-C1ES	457		457		None	102		102		None	925		925		None	883		883		None	350		350		None
08A-0040-C1ET	476		476		None	81.5		81.5		None	627		627		None	681		681		None	362		362		None
08A-0041-C1AS	448	J	448	J	None	37.1	J	37.1	J	ND or <QL	394	J	394	J	None	316	J	316	J	None	441	J	441	J	None
08A-0041-C1BS	1220		1220		None	61.1		61.1		None	293		293		None	137		137		None	250		250		None
08A-0041-C1CS	138		138		None	16.2	J	16.2	J	ND or <QL	194		194		None	171		171		None	255		255		None
08A-0041-C1DS	1220	J	1220	J	None	497	J	497	J	None	3470	J	3470	J	None	27000	J	27000	J	None	6590	J	6590	J	None
08A-0041-C1DT	822	J	822	J	None	191	J	191	J	None	1300	J	1300	J	None	4770	J	4770	J	None	2440	J	2440	J	None
08A-0041-C1ES	85.8		85.8		None	5	J	5	J	ND or <QL	100		100		None	270		270		None	102		102		None
08A-0042-C2AS	622	J	622	J	None	50.5	J	50.5	J	None	551	J	551	J	None	412	J	412	J	None	552	J	552	J	None
08A-0042-C2BS	43.8	J	43.8	J	None	3.6	J	3.6	J	ND or <QL	38.3	J	38.3	J	None	34.5	J	34.5	J	None	43.9	J	43.9	J	None
08A-0042-C2CS	721	J	721	J	None	135	J	135	J	None	856	J	856	J	None	712	J	712	J	None	1100	J	1100	J	None
08A-0042-C2DS	449		449		None	79.9		79.9		None	617		617		None	774		774		None	949		949		None
08A-0042-C2ES	2140	J	2140	J	None	435	J	435	J	None	6110	J	6110	J	None	16600	J	16600	J	None	11700	J	11700	J	None
08A-0043-C2AS	449	J	449	J	None	55.4	J	55.4	J	None	484	J	484	J	None	1390	J	1390	J	None	582	J	582	J	None
08A-0043-C2BS	77.9		614		Split-Replaced	10.9	J	169		Split-Replaced	143		940		Split-Replaced	135		1020		Split-Replaced	212		1200		Split-Replaced
08A-0043-C2CS	1550	J	1470		Split-Replaced	531	J	570		Split-Replaced	2770	J	2790		Split-Replaced	1350	J	1460		Split-Replaced	3820	J	3060		Split-Replaced
08A-0043-C2DS	455	J	455	J	None	100	J	100	J	None	768	J	768	J	None	376	J	376	J	None	1050	J	1050	J	None
08A-0044-C1AS	452	J	452	J	None	40.5	J	40.5	J	None	373	J	373	J	None	283	J	283	J	None	451	J	451	J	None
08A-0044-C1BS	430		430		None	100		100		None	532		532		None	510		510		None	717		717		None
08A-0044-C1CS	85.6		85.6		None	10.7	J	10.7	J	ND or <QL	125		125		None	123		123		None	194		194		None
08A-0044-C1DS	4.69	J	4.69	J	ND or <QL	3.72	J	3.72	J	ND or <QL	3.53	J	3.53	J	ND or <QL	1.05	J	1.05	J	ND or <QL	9.82		9.82		None
08A-0044-C1ES	3.74	J	3.74	J	ND or <QL	2.29	J	2.29	J	ND or <QL	2.78	J	2.78	J	ND or <QL	0.618	J	0.618	J	ND or <QL	2.48		2.48		None
08A-0045-C2AS	1570	J	1570	J	None	107	J	107	J	None	2850	J	2850	J	None	7460	J	7460	J	None	5130	J	5130	J	None
08A-0045-C2BS	5150	J	5150	J	None	815	J	815	J	None	11700	J	11700	J	None	27700	J	27700	J	None	20900	J	20900	J	None
08A-0045-C2CS	2810	J	2810	J	None	258	J	258	J	None	3450	J	3450	J	None	6260	J	6260	J	None	4070	J	4070	J	None
08A-0045-C2DS	2690		2690		None	274		274		None	3470		3470		None	2460		2460		None	1800		1800		None
08A-0045-C2ES	2710		2710		None	141		141		None	3130		3130		None	65.9		65.9		None	1300		1300		None
08A-0045-C2FS	595		595		None	44.4		44.4		None	619		619		None	28.9		28.9		None	321		321		None
08A-0045-C2FT	753		753		None	46.8		46.8		None	624		624		None	33.6		33.6		None	342		342		None
08A-0045-C2GS	197		197		None	15.1	J	15.1	J	ND or <QL	145		145		None	9.45		9.45		None	120		120		None
08A-0045-C2HS	86.5		86.5		None	31.6		31.6		None	92.3		92.3		None	24.3		24.3		None	74.5		74.5		None
08A-0045-C2IS	61.5		61.5		None	18.2	J	18.2	J	ND or <QL	66.6		66.6		None	12.9		12.9		None	81.6		81.6		None
08A-0046-C2AS	24	J	24	J	ND or <QL	< 0.172	U	< 0.172	U	ND or <QL	17.5	J	17.5	J	ND or <QL	15.1		15.1		None	14.3		14.3		None
08A-0047-C1AS	294	J	294	J	None	52	J	52	J	None	371	J	371	J	None	266	J	266	J	None	513	J	513	J	None
08A-0047-C1BS	109		109		None	9.07		9.07		None	146		146		None	59.8		59.8		None	165		165		None
08A-0047-C1CS	32.3		32.3		None	4.31	J	4.31	J	ND or <QL	86.7		86.7		None	87.4		87.4		None	134		134		None
08A-0047-C1DS	59.4	J	59.4	J	None	28.2		28.2		None	50.9		50.9		None	13.1		13.1		None	62.4		62.4		None
08A-0047-C1ES	5.82	J	5.82	J	ND or <QL	3.66	J	3.66	J	ND or <QL	5.07	J	5.07	J	ND or <QL	2.3		2.3		None	10.8		10.8		None
08A-0047-D4AS	141		141		None	21.9	J	21.9	J	ND or <QL	163		163		None	114		114		None	202		202		None
08A-0047-D4BS	124		124		None	17.9	J	17.9	J	ND or <QL	150		150		None	98.2		98.2		None	181		181		None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	Total HxCDF HxCDF ng/kg					Total PeCDD PeCDD ng/kg					Total PeCDF PeCDF ng/kg					Total TCDD TCDD ng/kg					Total TCDF TCDF ng/kg				
	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0047-D4CS	99.4		99.4		None	8.13	J	8.13	J	ND or <QL	121		121		None	65.1		65.1		None	149		149		None
08A-0047-D4DS	57.2		57.2		None	6.65	J	6.65	J	ND or <QL	80		80		None	45.5		45.5		None	88		88		None
08A-0047-D4ES	96.3		96.3		None	21.4		21.4		None	145		145		None	122		122		None	192		192		None
08A-0048-C2AS	59.1	J	59.1	J	None	4.82	J	4.82	J	ND or <QL	53.9	J	53.9	J	None	44.9	J	44.9	J	None	63.7	J	63.7	J	None
08A-0048-C2BS	22.5		22.5		None	26.4		26.4		None	29.5		29.5		None	8.54		8.54		None	51.5		51.5		None
08A-0048-C2CS	11.5	J	11.5	J	None	4.72	J	4.72	J	ND or <QL	17.6	J	17.6	J	None	1.09	J	1.09	J	None	40.4	J	40.4	J	None
08A-0048-C2DS	< 0.104	U	< 0.104	U	ND or <QL	< 0.116	U	< 0.116	U	ND or <QL	< 0.0611	U	< 0.0611	U	ND or <QL	< 0.236	U	< 0.236	U	ND or <QL	< 0.212	U	< 0.212	U	ND or <QL
08A-0048-C2ES	< 0.140	U	< 0.140	U	ND or <QL	0.409	J	0.409	J	ND or <QL	< 0.115	U	< 0.115	U	ND or <QL	< 0.208	U	< 0.208	U	ND or <QL	< 0.200	U	< 0.200	U	ND or <QL
08A-0049-C1AS	28.9		28.9		None	< 0.192	U	< 0.192	U	ND or <QL	40.9		40.9		None	20.3		20.3		None	55.1		55.1		None
08A-0049-C1BS	92		92		None	2.83	J	2.83	J	ND or <QL	71.3		71.3		None	39.3		39.3		None	146		146		None
08A-0049-C1CS	89.4		89.4		None	8.96	J	8.96	J	ND or <QL	90.6		90.6		None	41.5		41.5		None	125		125		None
08A-0049-C1DS	76.5		76.5		None	5.16	J	5.16	J	ND or <QL	95.9		95.9		None	69.3		69.3		None	127		127		None
08A-0049-C2ES	73		73		None	4.65	J	4.65	J	ND or <QL	85.7		85.7		None	76.2		76.2		None	150		150		None
08A-0050-C1AS	106	J	106	J	None	8.57	J	8.57	J	ND or <QL	133	J	133	J	None	79.2	J	79.2	J	None	184	J	184	J	None
08A-0050-C1BS	230		405		Split-Replaced	35		75.5		Split-Replaced	343		666		Split-Replaced	274		724		Split-Replaced	546		851		Split-Replaced
08A-0050-C1CS	363		450		Split-Replaced	90.8		130		Split-Replaced	545		672		Split-Replaced	727		2250		Split-Replaced	834		898		Split-Replaced
08A-0050-C1DS	< 0.226	U	< 0.226	U	ND or <QL	< 0.146	U	< 0.146	U	ND or <QL	< 0.106	U	< 0.106	U	ND or <QL	< 0.105	U	< 0.105	U	ND or <QL	< 0.113	U	< 0.113	U	ND or <QL
08A-0051-C1AS	70.9		70.9		None	5.84	J	5.84	J	ND or <QL	99.3		99.3		None	44		44		None	132		132		None
08A-0051-C1BS	15.1		12.2		Split-Replaced	< 0.0666	U	0.909	J	Split-Replaced	12.5	J	21.8		Split-Replaced	7.35		18.6		Split-Replaced	17.3		32.6		Split-Replaced
08A-0051-C2CS	21.7		35.3		Split-Replaced	1.72	J	2.9	J	Split-Replaced	26.6		36.4		Split-Replaced	8.77		19.5		Split-Replaced	31		45		Split-Replaced
08A-0052-C2AS	41.5		41.5		None	4.05	J	4.05	J	ND or <QL	57		57		None	40		40		None	65.3		65.3		None
08A-0054-C3AS	2.33	J	2.33	J	ND or <QL	0.118	J	0.118	J	ND or <QL	< 3.15	U	< 3.15	U	ND or <QL	3.02		3.02		None	< 4.48	U	< 4.48	U	ND or <QL
08A-0054-C3BS	< 0.0352	U	< 0.0352	U	ND or <QL	< 0.0268	U	< 0.0268	U	ND or <QL	< 0.0366	U	< 0.0366	U	ND or <QL	< 0.0241	U	< 0.0241	U	ND or <QL	< 0.0227	U	< 0.0227	U	ND or <QL
08A-0054-C3CS	< 0.404	U	< 0.404	U	ND or <QL	< 0.0191	U	< 0.0191	U	ND or <QL	< 0.0191	U	< 0.0191	U	ND or <QL	< 0.0243	U	< 0.0243	U	ND or <QL	< 0.0348	U	< 0.0348	U	ND or <QL
08A-0055-C2AS	531	J	531	J	None	44.8	J	44.8	J	ND or <QL	707	J	707	J	None	614	J	614	J	None	796	J	796	J	None
08A-0055-C2BS	409		409		None	69.5		69.5		None	452		452		None	902		902		None	379		379		None
08A-0055-C2CS	< 0.165	U	< 0.165	U	ND or <QL	< 0.286	U	< 0.286	U	ND or <QL	< 0.151	U	< 0.151	U	ND or <QL	< 0.386	U	< 0.386	U	ND or <QL	< 0.460	U	< 0.460	U	ND or <QL
08A-0055-C2DS	< 0.135	U	< 0.135	U	ND or <QL	< 0.212	U	< 0.212	U	ND or <QL	< 0.125	U	< 0.125	U	ND or <QL	< 0.268	U	< 0.268	U	ND or <QL	< 0.297	U	< 0.297	U	ND or <QL
08A-0055-C2ES	< 0.146	U	< 0.146	U	ND or <QL	< 0.175	U	< 0.175	U	ND or <QL	< 0.123	U	< 0.123	U	ND or <QL	< 0.263	U	< 0.263	U	ND or <QL	< 0.302	U	< 0.302	U	ND or <QL
08A-0055-C2FS	< 0.201	U	< 0.201	U	ND or <QL	< 0.316	U	< 0.316	U	ND or <QL	< 0.177	U	< 0.177	U	ND or <QL	< 0.373	U	< 0.373	U	ND or <QL	< 0.476	U	< 0.476	U	ND or <QL
08A-0056-C2AS	158	J	158	J	None	25.9	J	25.9	J	ND or <QL	232	J	232	J	None	174	J	174	J	None	253	J	253	J	None
08A-0056-C2BS	56.4		56.4		None	12.9	J	12.9	J	ND or <QL	159		159		None	88.3		88.3		None	182		182		None
08A-0056-C2CS	107		107		None	12.9	J	12.9	J	ND or <QL	236		236		None	221		221		None	316		316		None
08A-0056-C2DS	411		411		None	74.1		74.1		None	1280		1280		None	1530		1530		None	2300		2300		None
08A-0056-C2ES	1070	J	1070	J	None	163	J	163	J	None	3180	J	3180	J	None	4790	J	4790	J	None	5800	J	5800	J	None
08A-0056-C2FS	2380	J	2380	J	None	317	J	317	J	None	5790	J	5790	J	None	8990	J	8990	J	None	10900	J	10900	J	None
08A-0056-C2GS	2510	J	2510	J	None	278	J	278	J	None	7280	J	7280	J	None	18900	J	18900	J	None	16000	J	16000	J	None
08A-0056-C2HS	1030		1030		None	140		140		None	2430		2430		None	1950		1950		None	3860		3860		None
08A-0056-C2IS	75.7		75.7		None	3.61	J	3.61	J	ND or <QL	160		160		None	101		101		None	227		227		None
08A-0057-C1AS	190	J	190	J	None	13.3	J	13.3	J	ND or <QL	214	J	214	J	None	229	J	229	J	None	271	J	271	J	None
08A-0057-C1BS	1360	J	1360	J	None	105	J	105	J	None	3100	J	3100	J	None	4790	J	4790	J	None	6260	J	6260	J	None
08A-0057-C1CS	1250	J	1250	J	None	120	J	120	J	None	1460	J	1460	J	None	706	J	706	J	None	2060	J	2060	J	None
08A-0057-C1DS	465		465		None	108		108		None	1010		1010		None	1160		1160		None	1650		1650		None
08A-0057-C1ES	496		496		None	336		336		None	849		849		None	2890		2890		None	1170		1170		None
08A-0057-C1FS	3.86	J	3.86	J	ND or <QL	< 0.157	U	< 0.157	U	ND or <QL	2.07	J	2.07	J	ND or <QL	2.37	J	2.37	J	None	6.33	J	6.33	J	None
08A-0057-C1FT	13.1	J	13.1	J	ND or <QL	1.39	J	1.39	J	ND or <QL	18.2	J	18.2	J	ND or <QL	4.19	J	4.19	J	None	33.7	J	33.7	J	None
08A-0057-C1GS	2.21	J	2.21	J	ND or <QL	< 0.146	U	< 0.146	U	ND or <QL	3.86	J	3.86	J	ND or <QL	7.04		7.04		None	4.59		4.59		None
08A-0058-C1AS	217	J	217	J	None	16.2	J	16.2	J	ND or <QL	203	J	203	J	None	144	J	144	J	None	250	J	250	J	None
08A-0058-C1BS	31.3	J	31.3	J	None	< 0.327	UJ	< 0.327	UJ	ND or <QL	50.3	J	50.3	J	None	26.8	J	26.8	J	None	64	J	64	J	None
08A-0058-C1CS	161	J	161	J	None	22.8	J	22.8	J	ND or <QL	194	J	194	J	None	161	J	161	J	None	268	J	268	J	None
08A-0058-C1CT	84.4	J	84.4	J	None	1.91	J	1.91	J	ND or <QL	76	J	76	J	None	59.6	J	59.6	J	None	98.4	J	98.4	J	None
08A-0058-C1DS	111		111		None	8.68	J	8.68	J	ND or <QL	153		153		None	142		142		None	233		233		None
08A-0058-C1ES	25.4		25.4		None	0.733	J	0.733	J	ND or <QL	29.7		29.7		None	15		15		None	25.2		25.2		None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	Total HxCDF HXCDF ng/kg					Total PeCDD PECDD ng/kg					Total PeCDF PECDF ng/kg					Total TCDD TCDD ng/kg					Total TCDF TCDF ng/kg				
	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0058-C1FS	4.99	J	4.99	J	ND or <QL	1.97	J	1.97	J	ND or <QL	5.16	J	5.16	J	ND or <QL	0.768	J	0.768	J	ND or <QL	18.7		18.7		None
08A-0060-C1AS	366	J	366	J	None	26.2	J	26.2	J	ND or <QL	328	J	328	J	None	242	J	242	J	None	365	J	365	J	None
08A-0060-C1BS	167	J	167	J	None	11.4	J	11.4	J	ND or <QL	168	J	168	J	None	277	J	277	J	None	166	J	166	J	None
08A-0060-C1CS	751	J	751	J	None	58.9	J	58.9	J	None	820	J	820	J	None	544	J	544	J	None	975	J	975	J	None
08A-0060-C1DS	684	J	684	J	None	26.1	J	26.1	J	ND or <QL	699	J	699	J	None	1450	J	1450	J	None	824	J	824	J	None
08A-0060-C1ES	132		132		None	4.38	J	4.38	J	ND or <QL	117		117		None	108		108		None	106		106		None
08A-0060-C1FS	< 0.131	U	< 0.131	U	ND or <QL	< 0.400	U	< 0.400	U	ND or <QL	< 0.201	U	< 0.201	U	ND or <QL	< 0.208	U	< 0.208	U	ND or <QL	< 0.223	U	< 0.223	U	ND or <QL
08A-0060-C1GS	6.98	J	6.98	J	ND or <QL	< 0.233	U	< 0.233	U	ND or <QL	< 0.264	U	< 0.264	U	ND or <QL	< 0.169	U	< 0.169	U	ND or <QL	< 0.181	U	< 0.181	U	ND or <QL
08A-0061-C1AS	88.3		88.3		None	4.46	J	4.46	J	ND or <QL	150		150		None	87		87		None	171		171		None
08A-0061-C1BS	21.8		21.8		None	< 0.206	U	< 0.206	U	ND or <QL	28.5		28.5		None	15.1		15.1		None	22.1		22.1		None
08A-0061-C1CS	18.8		18.8		None	0.24	J	0.24	J	ND or <QL	28.7		28.7		None	25		25		None	34.6		34.6		None
08A-0061-C1DS	20	J	20	J	ND or <QL	2.95	J	2.95	J	ND or <QL	32.4		32.4		None	32.9		32.9		None	67.6		67.6		None
08A-0061-C1ES	< 0.171	U	< 0.171	U	ND or <QL	< 0.119	U	< 0.119	U	ND or <QL	< 0.138	U	< 0.138	U	ND or <QL	< 0.0836	U	< 0.0836	U	ND or <QL	< 0.118	U	< 0.118	U	ND or <QL
08A-0062-C1AS	366	J	366	J	None	34.9	J	34.9	J	ND or <QL	738	J	738	J	None	114	J	114	J	None	281	J	281	J	None
08A-0062-C1BS	1850	J	1850	J	None	183	J	183	J	None	3960	J	3960	J	None	75.7	J	75.7	J	None	1370	J	1370	J	None
08A-0062-C1CS	2850	J	2850	J	None	295	J	295	J	None	4030	J	4030	J	None	117	J	117	J	None	2180	J	2180	J	None
08A-0062-C1DS	178		178		None	12.8	J	12.8	J	ND or <QL	260		260		None	5.26		5.26		None	114		114		None
08A-0062-C1ES	521		916		Split-Replaced	39.6		80.3		Split-Replaced	459		691		Split-Replaced	23		40.1		Split-Replaced	251		396		Split-Replaced
08A-0062-C1FS	209		179		Split-Replaced	26.3		21.8		Split-Replaced	152		123		Split-Replaced	16.1		8.88		Split-Replaced	171		128		Split-Replaced
08A-0062-C1GS	5.04	J	8.72		Split-Replaced	0.31	J	< 0.319	U	Split-Replaced	4.95	J	7.36	J	Split-Replaced	0.299	J	< 0.178	U	Split-Replaced	1.96		6.55		Split-Replaced
08A-0062-C1HS	1.39	J	1.39	J	ND or <QL	0.216	J	0.216	J	ND or <QL	0.593	J	0.593	J	ND or <QL	0.15	J	0.15	J	ND or <QL	1.82		1.82		None
08A-0062-D1AS	83.6	J	83.6	J	None	5.37	J	5.37	J	ND or <QL	124	J	124	J	None	95.9	J	95.9	J	None	110	J	110	J	None
08A-0062-D1BS	144	J	144	J	None	5.61	J	5.61	J	ND or <QL	137	J	137	J	None	128	J	128	J	None	158	J	158	J	None
08A-0062-D1CS	454	J	454	J	None	41.4	J	41.4	J	None	465	J	465	J	None	432	J	432	J	None	522	J	522	J	None
08A-0062-D1DS	640	J	640	J	None	33.4	J	33.4	J	None	880	J	880	J	None	21.4	J	21.4	J	None	358	J	358	J	None
08A-0062-D1ES	2390	J	2390	J	None	221	J	221	J	None	3870	J	3870	J	None	74.1	J	74.1	J	None	1820	J	1820	J	None
08A-0062-D1ET	2410	J	2410	J	None	233	J	233	J	None	3930	J	3930	J	None	77.6	J	77.6	J	None	1850	J	1850	J	None
08A-0063-C1AS	512	J	512	J	None	74.3	J	74.3	J	None	530	J	530	J	None	779	J	779	J	None	639	J	639	J	None
08A-0063-C1BS	807	J	807	J	None	76.3	J	76.3	J	None	966	J	966	J	None	770	J	770	J	None	1190	J	1190	J	None
08A-0063-C1CS	713	J	713	J	None	49.8	J	49.8	J	None	704	J	704	J	None	582	J	582	J	None	877	J	877	J	None
08A-0063-C1DS	23.3		23.3		None	3.27	J	3.27	J	ND or <QL	36.4		36.4		None	32		32		None	44.4		44.4		None
08A-0064-C1AS	238	J	238	J	None	19.5	J	19.5	J	ND or <QL	267	J	267	J	None	144	J	144	J	None	410	J	410	J	None
08A-0064-C1BS	7.39	J	7.39	J	ND or <QL	0.509	J	0.509	J	ND or <QL	6.55	J	6.55	J	ND or <QL	5.09		5.09		None	7.88		7.88		None
08A-0064-C1BT	7.6	J	7.6	J	ND or <QL	< 0.0253	U	< 0.0253	U	ND or <QL	8.23	J	8.23	J	ND or <QL	5.61		5.61		None	8.63		8.63		None
08A-0064-C1CS	< 0.715	U	< 0.715	U	ND or <QL	< 0.0212	U	< 0.0212	U	ND or <QL	0.274	J	0.274	J	ND or <QL	< 0.0132	U	< 0.0132	U	ND or <QL	0.517	J	0.517	J	ND or <QL
08A-0065-C3AS	188	J	188	J	None	15.8	J	15.8	J	ND or <QL	241	J	241	J	None	197	J	197	J	None	262	J	262	J	None
08A-0065-C3BS	444		444		None	41		41		None	872		872		None	313		313		None	787		787		None
08A-0065-C3CS	1.17	J	1.17	J	ND or <QL	0.698	J	0.698	J	ND or <QL	< 0.645	U	< 0.645	U	ND or <QL	1.27		1.27		None	< 0.608	U	< 0.608	U	ND or <QL
08A-0065-C3DS	< 0.0385	U	< 0.0385	U	ND or <QL	0.244	J	0.244	J	ND or <QL	< 0.0289	U	< 0.0289	U	ND or <QL	0.346	J	0.346	J	ND or <QL	< 0.0560	U	< 0.0560	U	ND or <QL
08A-0065-C3ES	< 0.132	U	< 0.132	U	ND or <QL	< 0.193	U	< 0.193	U	ND or <QL	< 0.106	U	< 0.106	U	ND or <QL	< 0.137	U	< 0.137	U	ND or <QL	< 0.168	U	< 0.168	U	ND or <QL
08A-0065-C3ET	< 0.0967	U	< 0.0967	U	ND or <QL	< 0.0717	U	< 0.0717	U	ND or <QL	< 0.267	U	< 0.267	U	ND or <QL	< 0.0625	U	< 0.0625	U	ND or <QL	< 0.0388	U	< 0.0388	U	ND or <QL
08A-0065-C3FS	< 1.28	U	< 1.28	U	ND or <QL	0.698	J	0.698	J	ND or <QL	0.28	J	0.28	J	ND or <QL	< 0.110	U	< 0.110	U	ND or <QL	< 0.227	U	< 0.227	U	ND or <QL
08A-0065-C3GS	< 0.0809	U	< 0.0809	U	ND or <QL	< 0.144	U	< 0.144	U	ND or <QL	< 0.0883	U	< 0.0883	U	ND or <QL	< 0.113	U	< 0.113	U	ND or <QL	< 0.150	U	< 0.150	U	ND or <QL
08A-0065-C3HS	< 0.0685	U	< 0.0685	U	ND or <QL	< 0.115	U	< 0.115	U	ND or <QL	< 0.0912	U	< 0.0912	U	ND or <QL	< 0.103	U	< 0.103	U	ND or <QL	< 0.171	U	< 0.171	U	ND or <QL
08A-0065-C3IS	< 0.0747	U	< 0.0747	U	ND or <QL	< 0.118	U	< 0.118	U	ND or <QL	< 0.0716	U	< 0.0716	U	ND or <QL	< 0.0948	U	< 0.0948	U	ND or <QL	< 0.115	U	< 0.115	U	ND or <QL
08A-0066-C1AS	24.9		24.9		None	33.8	J	33.8	J	None	51.7		51.7		None	74	J	74	J	None	30.8		30.8		None
08A-0066-C1AT	39.4		39.4		None	< 0.0804	UJ	< 0.0804	UJ	ND or <QL	44.3		44.3		None	11.4	J	11.4	J	None	25.9		25.9		None
08A-0066-C1BS	24.3		24.3		None	< 0.117	U	< 0.117	U	ND or <QL	29.1		29.1		None	17.1		17.1		None	33.9		33.9		None
08A-0066-C1CS	23.1		23.1		None	32.5		32.5		None	38.9		38.9		None	50.4		50.4		None	44.9		44.9		None
08A-0066-C1DS	13.8	J	13.8	J	ND or <QL	< 0.173	U	< 0.173	U	ND or <QL	30		30		None	21.2		21.2		None	48.1		48.1		None
08A-0066-C1ES	< 0.119	U	< 0.119	U	ND or <QL	< 0.0867	U	< 0.0867	U	ND or <QL	< 0.107	U	< 0.107	U	ND or <QL	< 0.128	U	< 0.128	U	ND or <QL	2.07		2.07		None
08A-0067-C2AS	916	J	916	J	None	91.6	J	91.6	J	None	1630	J	1630	J	None	3730	J	3730	J	None	2890	J	2890	J	None
08A-0067-C2BS	5150	J	5150	J	None	574	J	574	J	None	10500	J	10500	J	None	32100	J	32100	J	None	21700	J	21700	J	None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	Total HxCDF HxCDF ng/kg					Total PeCDD PeCDD ng/kg					Total PeCDF PeCDF ng/kg					Total TCDD TCDD ng/kg					Total TCDF TCDF ng/kg				
	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0067-C2CS	540		540		None	171		171		None	1040		1040		None	2330		2330		None	1770		1770		None
08A-0067-C2DS	1.61	J	1.61	J	ND or <QL	< 0.142	U	< 0.142	U	ND or <QL	1.44	J	1.44	J	ND or <QL	7.62		7.62		None	5.62		5.62		None
08A-0067-C2ES	< 0.107	U	< 0.157	U	Split-Replaced	< 0.133	U	< 0.157	U	Split-Replaced	< 0.0930	U	0.206	J	Split-Replaced	< 0.182	U	< 0.172	U	Split-Replaced	< 0.172	U	< 0.164	U	Split-Replaced
08A-0067-C2FS	< 0.130	U	< 0.130	U	ND or <QL	< 0.118	U	< 0.118	U	ND or <QL	< 0.0566	U	< 0.0566	U	ND or <QL	< 0.0979	U	< 0.0979	U	ND or <QL	< 0.136	U	< 0.136	U	ND or <QL
08A-0068-C1AS	524	J	524	J	None	64.5	J	64.5	J	None	546	J	546	J	None	395	J	395	J	None	672	J	672	J	None
08A-0068-C1BS	672	J	672	J	None	138	J	138	J	None	785	J	785	J	None	1040	J	1040	J	None	947	J	947	J	None
08A-0068-C1CS	448		448		None	72.5		72.5		None	676		676		None	844		844		None	1020		1020		None
08A-0068-C1DS	298		298		None	27.5		27.5		None	348		348		None	466		466		None	298		298		None
08A-0068-C1ES	10.2	J	10.2	J	ND or <QL	1.25	J	1.25	J	ND or <QL	13	J	13	J	ND or <QL	11		11		None	12.6	J	12.6	J	None
08A-0068-C1ET	15.8	J	15.8	J	ND or <QL	0.638	J	0.638	J	ND or <QL	16.8		16.8		None	14.3		14.3		None	21.5	J	21.5	J	None
08A-0069-C1AS	603	J	603	J	None	78.6	J	78.6	J	None	714	J	714	J	None	1230	J	1230	J	None	880	J	880	J	None
08A-0069-C1BS	1980	J	1980	J	None	285	J	285	J	None	4470	J	4470	J	None	7210	J	7210	J	None	6100	J	6100	J	None
08A-0069-C1CS	1550	J	1550	J	None	485	J	485	J	None	2700	J	2700	J	None	6820	J	6820	J	None	1380	J	1380	J	None
08A-0069-C1DS	771		771		None	37.5		37.5		None	548		548		None	22.5		22.5		None	299		299		None
08A-0069-C1ES	27.9		27.9		None	0.47	J	0.47	J	ND or <QL	19.4		19.4		None	2.16		2.16		None	11.5		11.5		None
08A-0070-C3CS	49.3		49.3		None	4.53	J	4.53	J	ND or <QL	58.9		58.9		None	43.2		43.2		None	76.1		76.1		None
08A-0070-C3DS	43		43		None	4.97	J	4.97	J	ND or <QL	73.2		73.2		None	56.9		56.9		None	111		111		None
08A-0070-C3ES	244		244		None	26.3		26.3		None	330		330		None	321		321		None	474		474		None
08A-0071-C1AS	35.4		35.4		None	2.27	J	2.27	J	ND or <QL	30.5		30.5		None	15.9		15.9		None	30.4		30.4		None
08A-0071-C1BS	15.8	J	15.8	J	ND or <QL	0.662	J	0.662	J	ND or <QL	24.5		24.5		None	19.3		19.3		None	29.3		29.3		None
08A-0071-C1CS	8.9	J	8.9	J	ND or <QL	0.947	J	0.947	J	ND or <QL	8.29	J	8.29	J	ND or <QL	< 0.0917	U	< 0.0917	U	ND or <QL	20.3		20.3		None
08A-0072-C6AS	61.9		61.9		None	4.93	J	4.93	J	ND or <QL	82.8		82.8		None	48.1		48.1		None	68.3		68.3		None
08A-0073-C4AS	316	J	316	J	None	9.67	J	9.67	J	ND or <QL	236	J	236	J	None	156	J	156	J	None	282	J	282	J	None
08A-0073-C4BS	924	J	924	J	None	88.5	J	88.5	J	None	1090	J	1090	J	None	796	J	796	J	None	1290	J	1290	J	None
08A-0073-C4CS	179		179		None	13.6	J	13.6	J	ND or <QL	169		169		None	76.5		76.5		None	152		152		None
08A-0074-C2AS	216	J	216	J	None	18.5	J	18.5	J	ND or <QL	201	J	201	J	None	126	J	126	J	None	221	J	221	J	None
08A-0074-C2BS	171	J	171	J	None	13.1	J	13.1	J	ND or <QL	164	J	164	J	None	84.9	J	84.9	J	None	173	J	173	J	None
08A-0074-C2CS	211	J	211	J	None	13.4	J	13.4	J	ND or <QL	185	J	185	J	None	118	J	118	J	None	210	J	210	J	None
08A-0074-C2DS	60.2		60.2		None	1.47	J	1.47	J	ND or <QL	54.1		54.1		None	27.1		27.1		None	61.7		61.7		None
08A-0074-C2ES	431		431		None	33.7		33.7		None	385		385		None	217		217		None	413		413		None
08A-0074-C2FS	110	J	110	J	None	15	J	15	J	ND or <QL	124	J	124	J	None	76.1	J	76.1	J	None	128	J	128	J	None
08A-0074-C2GS	794		794		None	137		137		None	1550		1550		None	1730		1730		None	2590		2590		None
08A-0075-C1AS	42		42		None	< 0.183	U	< 0.183	U	ND or <QL	45.9		45.9		None	26.2		26.2		None	41.2		41.2		None
08A-0075-C1BS	55		55		None	8.48	J	8.48	J	ND or <QL	138		138		None	49.5		49.5		None	159		159		None
08A-0076-C5AS	357	J	357	J	None	66.9	J	66.9	J	ND or <QL	408	J	408	J	None	258	J	258	J	None	626	J	626	J	None
08A-0076-C5BS	15.4	J	15.4	J	ND or <QL	0.42	J	0.42	J	ND or <QL	18.9		18.9		None	8.95		8.95		None	10.8		10.8		None
08A-0076-C5CS	< 4.15	U	< 4.15	U	ND or <QL	< 0.0939	U	< 0.0939	U	ND or <QL	4.95	J	4.95	J	ND or <QL	3.15		3.15		None	1.48	J	1.48	J	ND or <QL
08A-0077-C2AS	417	J	417	J	None	43.2	J	43.2	J	None	420	J	420	J	None	360	J	360	J	None	520	J	520	J	None
08A-0077-C2BS	662		662		None	53.5		53.5		None	908		908		None	1200		1200		None	1330		1330		None
08A-0077-C2CS	2120		2120		None	247		247		None	4160		4160		None	10800		10800		None	7790		7790		None
08A-0077-C2DS	< 1.07	U	< 1.07	U	ND or <QL	< 0.176	U	< 0.176	U	ND or <QL	0.744	J	0.744	J	ND or <QL	2.49		2.49		None	3.19		3.19		None
08A-0078-C1AS	63.6		63.6		None	3.45	J	3.45	J	ND or <QL	61.5		61.5		None	20.7		20.7		None	50.6		50.6		None
08A-0078-C1BS	97.1		97.1		None	10.1	J	10.1	J	ND or <QL	87.7		87.7		None	44		44		None	85.5		85.5		None
08A-0078-C1CS	132		132		None	22.7		22.7		None	105		105		None	41.6		41.6		None	100		100		None
08A-0078-C1DS	370		370		None	71.3		71.3		None	645		645		None	325		325		None	688		688		None
08A-0078-C1ES	288		288		None	24.9	J	24.9	J	ND or <QL	293		293		None	148		148		None	321		321		None
08A-0078-C1FS	293		293		None	23.5	J	23.5	J	ND or <QL	337		337		None	115		115		None	315		315		None
08A-0078-C1GS	421		421		None	47		47		None	629		629		None	395		395		None	876		876		None
08A-0078-D4AS	63.7		63.7		None	3.18	J	3.18	J	ND or <QL	56.9		56.9		None	32.7		32.7		None	55.8		55.8		None
08A-0078-D4BS	53.7		53.7		None	1.87	J	1.87	J	ND or <QL	40.2		40.2		None	15.6		15.6		None	31.8		31.8		None
08A-0078-D4CS	25.3		25.3		None	0.937	J	0.937	J	ND or <QL	30.4		30.4		None	4.26		4.26		None	21.6		21.6		None
08A-0078-D4DS	31		31		None	5.93	J	5.93	J	ND or <QL	40		40		None	10.6		10.6		None	30.3		30.3		None
08A-0078-D4ES	206		206		None	21.7	J	21.7	J	ND or <QL	192		192		None	77.2		77.2		None	201		201		None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	Total HxCDF HxCDF ng/kg					Total PeCDD PeCDD ng/kg					Total PeCDF PeCDF ng/kg					Total TCDD TCDD ng/kg					Total TCDF TCDF ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0079-C4AS	70		70		None	10.9	J	10.9	J	ND or <QL	77.1		77.1		None	12.7		12.7		None	65.4		65.4		None
08A-0079-C4BS	41.5		41.5		None	21.6		21.6		None	46.9		46.9		None	12		12		None	59.5		59.5		None
08A-0079-C4CS	114		114		None	7.83	J	7.83	J	ND or <QL	97.4		97.4		None	38.6		38.6		None	122		122		None
08A-0079-C4DS	87.1		87.1		None	11.8	J	11.8	J	ND or <QL	96.8		96.8		None	20.4		20.4		None	85.9	J	85.9	J	None
08A-0079-C4ES	57.7		57.7		None	7.04	J	7.04	J	ND or <QL	67		67		None	46.3		46.3		None	77.3		77.3		None
08A-0080-C1AS	72		72		None	16.5	J	16.5	J	ND or <QL	77.1		77.1		None	27.6		27.6		None	72.4		72.4		None
08A-0080-C1BS	37.9		37.9		None	9.84	J	9.84	J	ND or <QL	48.6		48.6		None	19.9		19.9		None	38.2		38.2		None
08A-0080-C1CS	38		38		None	12.6	J	12.6	J	ND or <QL	45.3		45.3		None	19.7		19.7		None	44.2		44.2		None
08A-0080-C1DS	192		192		None	16.4	J	16.4	J	ND or <QL	196		196		None	123		123		None	245		245		None
08A-0080-C1ES	77.1		77.1		None	7.51	J	7.51	J	ND or <QL	111		111		None	117		117		None	144		144		None
08A-0081-C2AS	47.4		47.4		None	6.08	J	6.08	J	ND or <QL	53		53		None	6.11		6.11		None	32.2		32.2		None
08A-0081-C2BS	8.03	J	8.03	J	ND or <QL	< 0.198	U	< 0.198	U	ND or <QL	11.7	J	11.7	J	ND or <QL	1.54	J	1.54	J	ND or <QL	11.5		11.5		None
08A-0081-C2CS	25.7		25.7		None	4.27	J	4.27	J	ND or <QL	32.9		32.9		None	4.52		4.52		None	19.7		19.7		None
08A-0081-C2DS	23.5		23.5		None	1.91	J	1.91	J	ND or <QL	32.6		32.6		None	5.43		5.43		None	31.6		31.6		None
08A-0082-C2AS	77.5		77.5		None	13.7	J	13.7	J	ND or <QL	66.4		66.4		None	19.5		19.5		None	38.8		38.8		None
08A-0082-C2BS	120		120		None	236		236		None	107		107		None	31.5		31.5		None	60.9		60.9		None
08A-0082-C2CS	163		163		None	82.9		82.9		None	145		145		None	35.7		35.7		None	111		111		None
08A-0082-C2DS	52.2		52.2		None	8.02	J	8.02	J	ND or <QL	70.3		70.3		None	13		13		None	38.4		38.4		None
08A-0082-C2ES	218		218		None	473		473		None	185		185		None	106		106		None	189		189		None
08A-0082-C2FS	168		168		None	61	J	61	J	None	210		210		None	87		87		None	188		188		None
08A-0082-C2FT	163		163		None	134	J	134	J	None	249		249		None	79		79		None	173		173		None
08A-0082-C2GS	170		170		None	78.1		78.1		None	219		219		None	97.3		97.3		None	202		202		None
08A-0082-C2HS	516		516		None	112		112		None	451		451		None	264		264		None	474		474		None
08A-0082-C2IS	333		333		None	65.8		65.8		None	460		460		None	135		135		None	343		343		None
08A-0082-C2JS	251		251		None	37.6		37.6		None	406		406		None	126		126		None	352		352		None
08A-0082-C2KS	160		160		None	20.7		20.7		None	176		176		None	29.9		29.9		None	144		144		None
08A-0083-C2AS	23		23		None	2.03	J	2.03	J	ND or <QL	22.2		22.2		None	1.06	J	1.06	J	ND or <QL	14.4		14.4		None
08A-0083-C2BS	15.6	J	15.6	J	ND or <QL	1.18	J	1.18	J	ND or <QL	23.1		23.1		None	1.59	J	1.59	J	ND or <QL	14.9		14.9		None
08A-0083-C2CS	16.2	J	16.2	J	ND or <QL	2.24	J	2.24	J	ND or <QL	17.7	J	17.7	J	ND or <QL	1.51	J	1.51	J	ND or <QL	6.87		6.87		None
08A-0083-C2DS	38.5		38.5		None	7.89	J	7.89	J	ND or <QL	60.5		60.5		None	3.46		3.46		None	22.9		22.9		None
08A-0083-C2ES	24.5		24.5		None	2.48	J	2.48	J	ND or <QL	27.8		27.8		None	3.12		3.12		None	23.7	J	23.7	J	None
08A-0084-C1AS	23.6		23.6		None	< 0.270	U	< 0.270	U	ND or <QL	23.3		23.3		None	5.89		5.89		None	21.7		21.7		None
08A-0084-C1BS	13.6	J	13.6	J	ND or <QL	< 0.268	U	< 0.268	U	ND or <QL	11.6	J	11.6	J	ND or <QL	0.887	J	0.887	J	ND or <QL	4.56		4.56		None
08A-0084-C1BT	19.5		19.5		None	< 0.422	U	< 0.422	U	ND or <QL	13.6	J	13.6	J	ND or <QL	2.55	J	2.55	J	None	9.97		9.97		None
08A-0084-C1CS	430	J	430	J	None	86.9	J	86.9	J	None	357	J	357	J	None	152	J	152	J	None	374	J	374	J	None
08A-0084-C1DS	233		233		None	75.8		75.8		None	322		322		None	111		111		None	305		305		None
08A-0084-C1ES	365		445	BD	Split-Replaced	57.7		69.3	BD	Split-Replaced	347		390	BD	Split-Replaced	119		162	D	Split-Replaced	334		385	D	Split-Replaced
08A-0084-C1FS	467		577	B	Split-Replaced	70.6		106		Split-Replaced	390		496	B	Split-Replaced	125		173	B	Split-Replaced	425		530	B	Split-Replaced
08A-0084-C1GS	124		124		None	24.6		24.6		None	188		188		None	82.5		82.5		None	195		195		None
08A-0085-C1AS	41.6		41.6		None	2.65	J	2.65	J	ND or <QL	43.6		43.6		None	9.02		9.02		None	30.6		30.6		None
08A-0085-C1BS	34.2		34.2		None	3.8	J	3.8	J	ND or <QL	26.6	J	26.6	J	ND or <QL	5.56		5.56		None	16.3		16.3		None
08A-0085-C1CS	209		209		None	215		215		None	184		184		None	71.2		71.2		None	96.8		96.8		None
08A-0085-C1DS	115		115		None	106		106		None	156		156		None	18.8		18.8		None	68.2		68.2		None
08A-0085-C1ES	349		349		None	89.1		89.1		None	659		659		None	95.1		95.1		None	598		598		None
08A-0085-C1FS	255		255		None	34.3		34.3		None	319		319		None	19.1		19.1		None	202		202		None
08A-0085-C1FT	361		361		None	35.2		35.2		None	425		425		None	20.7		20.7		None	278		278		None
08A-0085-C1GS	464	J	464	J	None	105	J	105	J	None	990	J	990	J	None	89.8	J	89.8	J	None	591	J	591	J	None
08A-0085-C1HS	330		330		None	19.3	J	19.3	J	ND or <QL	364		364		None	17		17		None	211		211		None
08A-0085-C1IS	50.8		50.8		None	3.48	J	3.48	J	ND or <QL	39.2		39.2		None	2.13		2.13		None	37.2		37.2		None
08A-0085-C1JS	3.68	J	3.68	J	ND or <QL	< 0.142	U	< 0.142	U	ND or <QL	2.05	J	2.05	J	ND or <QL	< 0.128	U	< 0.128	U	ND or <QL	1.57	J	1.57	J	ND or <QL
08A-0086-C3AS	36.6		36.6		None	2.67	J	2.67	J	ND or <QL	48.2		48.2		None	4.44		4.44		None	22.9		22.9		None
08A-0086-C3BS	4.92	J	4.92	J	ND or <QL	< 0.0949	U	< 0.0949	U	ND or <QL	7.46	J	7.46	J	ND or <QL	< 0.143	U	< 0.143	U	ND or <QL	2.06	J	2.06	J	None
08A-0086-C3BT	32.9	J	32.9	J	None	0.555	J	0.555	J	ND or <QL	50	J	50	J	None	< 0.0696	U	< 0.0696	U	ND or <QL	8.37	J	8.37	J	None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	Total HxCDF HxCDF ng/kg					Total PeCDD PeCDD ng/kg					Total PeCDF PeCDF ng/kg					Total TCDD TCDD ng/kg					Total TCDF TCDF ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0086-C3CS	< 2.16	U	< 2.16	U	ND or <QL	< 0.0495	U	< 0.0495	U	ND or <QL	< 2.40	U	< 2.40	U	ND or <QL	< 0.0893	U	< 0.0893	U	ND or <QL	< 0.544	U	< 0.544	U	ND or <QL
08A-0086-C3DS	< 0.0770	U	< 0.0770	U	ND or <QL	< 0.116	U	< 0.116	U	ND or <QL	0.136	J	0.136	J	ND or <QL	< 0.0793	U	< 0.0793	U	ND or <QL	4.04		4.04		None
08A-0086-C3ES	< 0.0383	U	< 0.0383	U	ND or <QL	< 0.403	U	< 0.403	U	ND or <QL	< 0.0418	U	< 0.0418	U	ND or <QL	< 0.322	U	< 0.322	U	ND or <QL	3.15		3.15		None
08A-0087-C3AS	8.98	J	8.98	J	ND or <QL	< 0.0957	U	< 0.0957	U	ND or <QL	7.49	J	7.49	J	ND or <QL	1.62	J	1.62	J	ND or <QL	2.07		2.07		None
08A-0087-C3BS	< 0.0416	U	< 0.0416	U	ND or <QL	< 0.374	U	< 0.374	U	ND or <QL	< 0.0404	U	< 0.0404	U	ND or <QL	< 0.394	U	< 0.394	U	ND or <QL	1.84		1.84		None
08A-0087-C3CS	< 0.0727	U	< 0.0727	U	ND or <QL	< 1.24	U	< 1.24	U	ND or <QL	< 0.0843	U	< 0.0843	U	ND or <QL	< 0.567	U	< 0.567	U	ND or <QL	< 0.0889	U	< 0.0889	U	ND or <QL
08A-0087-C3DS	< 0.0301	U	< 0.0301	U	ND or <QL	< 0.594	U	< 0.594	U	ND or <QL	< 0.0256	U	< 0.0256	U	ND or <QL	< 0.522	U	< 0.522	U	ND or <QL	< 0.0432	U	< 0.0432	U	ND or <QL
08A-0088-C1AS	4.04	J	4.04	J	ND or <QL	0.205	J	0.205	J	ND or <QL	5.86	J	5.86	J	ND or <QL	1.17		1.17		None	1.7		1.7		None
08A-0088-C1BS	< 0.0357	U	< 0.0357	U	ND or <QL	< 0.0456	U	< 0.0456	U	ND or <QL	< 0.0366	U	< 0.0366	U	ND or <QL	< 0.0545	U	< 0.0545	U	ND or <QL	< 0.0706	U	< 0.0706	U	ND or <QL
08A-0088-C1CS	< 0.0718	U	< 0.0718	U	ND or <QL	< 0.0973	U	< 0.0973	U	ND or <QL	< 0.0689	U	< 0.0689	U	ND or <QL	< 0.0731	U	< 0.0731	U	ND or <QL	< 0.103	U	< 0.103	U	ND or <QL
08A-0089-C2AS	33.5		33.5		None	43.9		43.9		None	35.5		35.5		None	10.6		10.6		None	31.3		31.3		None
08A-0089-C2BS	16.2	J	25.6		Split-Replaced	3.76	J	3.62	J	Split-Replaced	13.7	J	21.8		Split-Replaced	4.4		3.07		Split-Replaced	16.3		18.6		Split-Replaced
08A-0089-C2CS	16.3	J	33		Split-Replaced	2.14	J	26.5		Split-Replaced	18.8	J	29		Split-Replaced	3.27		24.1		Split-Replaced	16		37.9		Split-Replaced
08A-0089-C2DS	18.3		18.3		None	1.39	J	1.39	J	ND or <QL	21.8		21.8		None	3.55		3.55		None	19.8		19.8		None
08A-0089-C2ES	21.9		21.9		None	0.538	J	0.538	J	ND or <QL	27.4		27.4		None	0.443	J	0.443	J	ND or <QL	12.6		12.6		None
08A-0090-C5AS	48		48		None	4.04	J	4.04	J	ND or <QL	72.3		72.3		None	2.68		2.68		None	33.7		33.7		None
08A-0090-C5BS	7.11	J	7.11	J	ND or <QL	< 0.100	U	< 0.100	U	ND or <QL	6.16	J	6.16	J	ND or <QL	< 0.0764	U	< 0.0764	U	ND or <QL	0.572	J	0.572	J	ND or <QL
08A-0092-C1AS	28.4		28.4		None	0.476	J	0.476	J	ND or <QL	7.02	J	7.02	J	ND or <QL	< 0.225	U	< 0.225	U	ND or <QL	3.46		3.46		None
08A-0096-C3AS	43.2		43.2		None	2.91	J	2.91	J	ND or <QL	38.1		38.1		None	9.42		9.42		None	21.8		21.8		None
08A-0096-C3BS	80.1		80.1		None	10.5	J	10.5	J	ND or <QL	144		144		None	30.4		30.4		None	109		109		None
08A-0098-C1AS	265		265		None	12.5	J	12.5	J	ND or <QL	327		327		None	27.6		27.6		None	82.1		82.1		None
08A-0098-C1BS	93.7		93.7		None	7.07	J	7.07	J	ND or <QL	149		149		None	57.7		57.7		None	140		140		None
08A-0098-C1CS	560	J	560	J	None	33.1	J	33.1	J	None	461	J	461	J	None	14.6	J	14.6	J	None	478	J	478	J	None
08A-0098-C1DS	62.3	J	62.3	J	None	4.82	J	4.82	J	ND or <QL	44.2	J	44.2	J	None	5.06	J	5.06	J	None	38.5	J	38.5	J	None
08A-0098-C1ES	49.6	J	63.1		Split-Replaced	6.9	J	11.5		Split-Replaced	47.9	J	59.6		Split-Replaced	4.53	J	17.2		Split-Replaced	39.8	J	89.9		Split-Replaced
08A-0098-C1FS	97.7	J	88.4		Split-Replaced	8.94	J	13.7		Split-Replaced	117	J	93.1		Split-Replaced	10.5	J	8.23		Split-Replaced	348	J	167		Split-Replaced
08A-0098-C1GS	116	J	116	J	None	7.17	J	7.17	J	ND or <QL	83.1	J	83.1	J	None	2.59	J	2.59	J	ND or <QL	147	J	147	J	None
08A-0099-C1AS	26.8		26.8		None	4.75	J	4.75	J	ND or <QL	26		26		None	9.41		9.41		None	19.4		19.4		None
08A-0099-C1BS	99.1		99.1		None	89.5		89.5		None	84.1		84.1		None	19.3		19.3		None	73.8		73.8		None
08A-0099-C1CS	304	J	304	J	None	49.4	J	49.4	J	None	228	J	228	J	None	77.4	J	77.4	J	None	182	J	182	J	None
08A-0099-C1DS	281	J	281	J	None	31.7	J	31.7	J	ND or <QL	274	J	274	J	None	94.7	J	94.7	J	None	243	J	243	J	None
08A-0099-C1ES	475		475		None	78.2		78.2		None	492		492		None	235		235		None	506		506		None
08A-0099-C1FS	26.8	J	26.8	J	ND or <QL	4.53	J	4.53	J	ND or <QL	44.1		44.1		None	< 0.147	U	< 0.147	U	ND or <QL	73		73		None
08A-0100-C1AS	21.8		21.8		None	0.69	J	0.69	J	ND or <QL	21.2		21.2		None	5.12		5.12		None	11.1		11.1		None
08A-0100-C1BS	< 15.1	UJ	< 15.1	UJ	ND or <QL	< 0.353	UJ	< 0.353	UJ	ND or <QL	< 22.1	UJ	< 22.1	UJ	ND or <QL	< 0.300	UJ	< 0.300	UJ	ND or <QL	26.9	J	26.9	J	None
08A-0100-C1CS	< 0.192	U	< 0.192	U	ND or <QL	< 0.186	U	< 0.186	U	ND or <QL	< 0.122	U	< 0.122	U	ND or <QL	< 0.270	U	< 0.270	U	ND or <QL	< 0.243	U	< 0.243	U	ND or <QL
08A-0100-C1DS	< 0.173	U	< 0.173	U	ND or <QL	3.14	J	3.14	J	ND or <QL	< 0.122	U	< 0.122	U	ND or <QL	2.94		2.94		None	< 0.315	U	< 0.315	U	ND or <QL
08A-0101-C1AS	384	J	384	J	None	86.8	J	86.8	J	None	614	J	614	J	None	813	J	813	J	None	767	J	767	J	None
08A-0101-C1BS	724	J	724	J	None	65.2	J	65.2	J	None	625	J	625	J	None	73.6	J	73.6	J	None	470	J	470	J	None
08A-0101-C1CS	505	J	505	J	None	50.5	J	50.5	J	None	928	J	928	J	None	23.1	J	23.1	J	None	242	J	242	J	None
08A-0101-C1DS	450	J	450	J	None	9.12	J	9.12	J	ND or <QL	310		310		None	2.99		2.99		None	105	J	105	J	None
08A-0101-C1ES	106	J	106	J	None	8.32	J	8.32	J	ND or <QL	73.6	J	73.6	J	None	5.13	J	5.13	J	None	74.7	J	74.7	J	None
08A-0101-C1FS	< 17.4	UJ	< 17.4	UJ	ND or <QL	1.07	J	1.07	J	ND or <QL	< 22.3	UJ	< 22.3	UJ	ND or <QL	2.41	J	2.41	J	ND or <QL	40.5	J	40.5	J	None
08A-0101-C1GS	< 8.89	UJ	< 8.89	UJ	ND or <QL	< 0.120	UJ	< 0.120	UJ	ND or <QL	< 7.15	UJ	< 7.15	UJ	ND or <QL	< 0.0796	UJ	< 0.0796	UJ	ND or <QL	9.11	J	9.11	J	None
08A-0103-C1AS	19.3		19.3		None	1.65	J	1.65	J	ND or <QL	15.6	J	15.6	J	ND or <QL	4.04		4.04		None	19.7		19.7		None
08A-0103-C1ES	< 0.0394	U	< 0.0394	U	ND or <QL	1.43	J	1.43	J	ND or <QL	< 0.0332	U	< 0.0332	U	ND or <QL	0.485	J	0.485	J	ND or <QL	< 0.0377	U	< 0.0377	U	ND or <QL
08A-0103-C1FS	< 0.0902	U	< 0.0902	U	ND or <QL	< 0.167	U	< 0.167	U	ND or <QL	< 0.117	U	< 0.117	U	ND or <QL	< 0.0905	U	< 0.0905	U	ND or <QL	< 0.0587	U	< 0.0587	U	ND or <QL
08A-0103-C2BS	< 3.2	U	< 3.2	U	ND or <QL	0.494	J	0.494	J	ND or <QL	< 2.88	U	< 2.88	U	ND or <QL	0.716	J	0.716	J	ND or <QL	3.75		3.75		None
08A-0103-C2CS	< 1.03	U	< 1.03	U	ND or <QL	0.211	J	0.211	J	ND or <QL	< 1.00	U	< 1.00	U	ND or <QL	0.187	J	0.187	J	ND or <QL	< 0.913	U	< 0.913	U	ND or <QL
08A-0103-C2DS	< 0.136	U	< 0.136	U	ND or <QL	6.95	J	6.95	J	ND or <QL	< 0.198	U	< 0.198	U	ND or <QL	10		10		None	< 0.370	U	< 0.370	U	ND or <QL
08A-0104-C1AS	706	J	706	J	None	42.7	J	42.7	J	ND or <QL	636	J	636	J	None	21.1	J	21.1	J	None	358	J	358	J	None
08A-0104-C1BS	92		92		None	< 0.979	U	< 0.979	U	ND or <QL	49.9		49.9		None	< 0.881	U	< 0.881	U	ND or <QL	14		14		None
08A-0104-C1CS	< 4.00	U	< 4.00	U	ND or <QL	< 1.53	U	< 1.53	U	ND or <QL	< 3.30	U	< 3.30	U	ND or <QL	< 1.44	U	< 1.44	U	ND or <QL	< 1.82	U	< 1.82	U	ND or <QL

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	Total HxCDF HXCDF ng/kg					Total PeCDD PECDD ng/kg					Total PeCDF PECDF ng/kg					Total TCDD TCDD ng/kg					Total TCDF TCDF ng/kg				
	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]	Original		Adjusted		Adjustment [†]
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0104-C1DS	< 12.9	UJ	< 12.9	UJ	ND or <QL	< 0.183	UJ	< 0.183	UJ	ND or <QL	< 9.80	UJ	< 9.80	UJ	ND or <QL	0.946	J	0.946	J	ND or <QL	19	J	19	J	None
08A-0104-C1ES	29.3	J	29.3	J	ND or <QL	4.2	J	4.2	J	ND or <QL	< 17.3	UJ	< 17.3	UJ	ND or <QL	2.92	J	2.92	J	ND or <QL	43.1	J	43.1	J	None
08A-0104-C1FS	29.8		29.8		None	4.11	J	4.11	J	ND or <QL	32.5		32.5		None	4.34		4.34		None	51.7		51.7		None
08A-0104-C1FT	< 13.7	UJ	< 13.7	UJ	ND or <QL	2.42	J	2.42	J	ND or <QL	< 19.0	UJ	< 19.0	UJ	ND or <QL	3.93	J	3.93	J	None	27.5	J	27.5	J	None
08A-0104-C1GS	19.3	J	19.3	J	ND or <QL	1.91	J	1.91	J	ND or <QL	23.9	J	23.9	J	ND or <QL	0.782	J	0.782	J	ND or <QL	46.7	J	46.7	J	None
08A-0106-C1AS	6.14	J	6.14	J	ND or <QL	1.5	J	1.5	J	ND or <QL	7.65	J	7.65	J	ND or <QL	0.892	J	0.892	J	ND or <QL	4.64		4.64		None
08A-0107-C2AS	7.85	J	7.85	J	ND or <QL	0.54	J	0.54	J	ND or <QL	9.07	J	9.07	J	ND or <QL	5.39		5.39		None	5.4		5.4		None
08A-0108-C1AS	38.6		38.6		None	2.66	J	2.66	J	ND or <QL	30.7		30.7		None	0.895	J	0.895	J	ND or <QL	16		16		None
08A-0108-C1BS	37.7		37.7		None	3.49	J	3.49	J	ND or <QL	35.7		35.7		None	2.17		2.17		None	20.5		20.5		None
08A-0109-C3AS	0.484	J	0.484	J	ND or <QL	1.09	J	1.09	J	ND or <QL	0.602	J	0.602	J	ND or <QL	< 0.0807	UJ	< 0.0807	UJ	ND or <QL	< 0.118	UJ	< 0.118	UJ	ND or <QL
08A-0109-C3BS	< 0.0740	U	< 0.0740	U	ND or <QL	< 0.101	U	< 0.101	U	ND or <QL	< 0.0580	U	< 0.0580	U	ND or <QL	< 0.0563	U	< 0.0563	U	ND or <QL	0.92	J	0.92	J	ND or <QL
08A-0109-C3CS	0.581	J	0.581	J	ND or <QL	0.569	J	0.569	J	ND or <QL	0.213	J	0.213	J	ND or <QL	< 0.0244	U	< 0.0244	U	ND or <QL	0.449	J	0.449	J	ND or <QL
08A-0109-C3DS	< 0.0601	U	< 0.0601	U	ND or <QL	0.331	J	0.331	J	ND or <QL	< 0.0285	U	< 0.0285	U	ND or <QL	< 0.0282	U	< 0.0282	U	ND or <QL	< 0.0560	U	< 0.0560	U	ND or <QL
08A-0109-C3ES	< 0.0569	U	< 0.0569	U	ND or <QL	< 0.0793	U	< 0.0793	U	ND or <QL	< 0.0563	U	< 0.0563	U	ND or <QL	< 0.109	U	< 0.109	U	ND or <QL	< 0.101	U	< 0.101	U	ND or <QL
08A-0109-C3ET	< 0.0776	U	< 0.0776	U	ND or <QL	< 0.106	U	< 0.106	U	ND or <QL	< 0.0752	U	< 0.0752	U	ND or <QL	< 0.124	U	< 0.124	U	ND or <QL	< 0.153	U	< 0.153	U	ND or <QL
08A-0110-C1AS	136		136		None	12.4	J	12.4	J	ND or <QL	125		125		None	93.2		93.2		None	79.8		79.8		None
08A-0110-C1BS	64.3		64.3		None	2.94	J	2.94	J	ND or <QL	66.8		66.8		None	16.5		16.5		None	35.9		35.9		None
08A-0110-C1CS	234		234		None	27.2	J	27.2	J	ND or <QL	237		237		None	38.5		38.5		None	140		140		None
08A-0110-C1DS	9.45	J	9.45	J	ND or <QL	< 0.470	UJ	< 0.470	UJ	ND or <QL	15.4	J	15.4	J	ND or <QL	16.1	J	16.1	J	None	16	J	16	J	None
08A-0110-C1ES	< 0.270	U	< 0.270	U	ND or <QL	< 0.290	U	< 0.290	U	ND or <QL	< 0.159	U	< 0.159	U	ND or <QL	< 0.301	U	< 0.301	U	ND or <QL	< 0.326	U	< 0.326	U	ND or <QL
08A-0110-C1FS	< 0.629	U	< 0.629	U	ND or <QL	< 0.102	U	< 0.102	U	ND or <QL	0.776	J	0.776	J	ND or <QL	< 0.142	U	< 0.142	U	ND or <QL	1.76		1.76		None
08A-0110-C1GS	< 0.123	U	< 0.123	U	ND or <QL	< 0.128	U	< 0.128	U	ND or <QL	< 0.0753	U	< 0.0753	U	ND or <QL	< 0.138	U	< 0.138	U	ND or <QL	< 0.205	U	< 0.205	U	ND or <QL
08A-0111-C1AS	3.81	J	3.81	J	ND or <QL	< 0.0925	U	< 0.0925	U	ND or <QL	3.53	J	3.53	J	ND or <QL	0.367	J	0.367	J	ND or <QL	1.53		1.53		None
08A-0111-C1BS	10.2	J	10.2	J	ND or <QL	4.96	J	4.96	J	ND or <QL	12.3	J	12.3	J	ND or <QL	1.25	J	1.25	J	ND or <QL	10.7		10.7		None
08A-0111-C1CS	161		161		None	11.9	J	11.9	J	ND or <QL	127		127		None	10		10		None	110		110		None
08A-0111-C1DS	24.2		24.2		None	2.94	J	2.94	J	ND or <QL	30.5		30.5		None	3.4		3.4		None	27.2		27.2		None
08A-0112-C2AS	14.6	J	14.6	J	ND or <QL	1.28	J	1.28	J	ND or <QL	12.9	J	12.9	J	ND or <QL	1.69	J	1.69	J	ND or <QL	9.67		9.67		None
08A-0112-C2BS	35.4		35.4		None	4.55	J	4.55	J	ND or <QL	34.1		34.1		None	4.1		4.1		None	26.5		26.5		None
08A-0112-C2CS	20.4		20.4		None	3.98	J	3.98	J	ND or <QL	24.1		24.1		None	4.56		4.56		None	22.5		22.5		None
08A-0112-C2DS	14.3	J	14.3	J	ND or <QL	0.843	J	0.843	J	ND or <QL	15	J	15	J	ND or <QL	0.744	J	0.744	J	ND or <QL	14		14		None
08A-0113-C1AS	28.1		28.1		None	0.61	J	0.61	J	ND or <QL	15.4	J	15.4	J	ND or <QL	2.68		2.68		None	8.77		8.77		None
08A-0113-C1BS	59.6		59.6		None	3.61	J	3.61	J	ND or <QL	39.4		39.4		None	6.8		6.8		None	25.2		25.2		None
08A-0113-C1CS	45.3	J	45.3	J	None	2.96	J	2.96	J	ND or <QL	30.6	J	30.6	J	ND or <QL	6.38	J	6.38	J	None	22.9	J	22.9	J	None
08A-0114-C2AS	367		367		None	35.3		35.3		None	601		601		None	552		552		None	342		342		None
08A-0114-C2BS	24.6		24.6		None	5.03	J	5.03	J	ND or <QL	26.3		26.3		None	7.28		7.28		None	14.6		14.6		None
08A-0114-C2CS	8.39	J	8.39	J	ND or <QL	1.28	J	1.28	J	ND or <QL	12.6	J	12.6	J	ND or <QL	4.05		4.05		None	8.67		8.67		None
08A-0114-C2DS	14.7	J	14.7	J	ND or <QL	0.836	J	0.836	J	ND or <QL	20.9		20.9		None	11.3		11.3		None	10.7		10.7		None
08A-0114-C2ES	1.57	J	1.57	J	ND or <QL	0.462	J	0.462	J	ND or <QL	1.77	J	1.77	J	ND or <QL	0.744	J	0.744	J	ND or <QL	1.14	J	1.14	J	ND or <QL
08A-0114-C2FS	< 0.0379	U	< 0.0379	U	ND or <QL	< 0.0518	U	< 0.0518	U	ND or <QL	< 0.0267	U	< 0.0267	U	ND or <QL	< 0.0638	U	< 0.0638	U	ND or <QL	< 0.0387	U	< 0.0387	U	ND or <QL
08A-0115-C1AS	719	J	719	J	None	71.7	J	71.7	J	None	881	J	881	J	None	1190	J	1190	J	None	1530	J	1530	J	None
08A-0115-C1BS	1100	J	1100	J	None	107	J	107	J	None	2970	J	2970	J	None	6020	J	6020	J	None	6280	J	6280	J	None
08A-0115-C1CS	3360	J	3360	J	None	512	J	512	J	None	5060	J	5060	J	None	12000	J	12000	J	None	13000	J	13000	J	None
08A-0115-C1CT	4980	J	4980	J	None	879	J	879	J	None	14700	J	14700	J	None	15400	J	15400	J	None	19800	J	19800	J	None
08A-0115-C1DS	4890	J	4890	J	None	6260	J	6260	J	None	11900	J	11900	J	None	67900	J	67900	J	None	9050	J	9050	J	None
08A-0115-C1ES	309	J	309	J	None	31.7	J	31.7	J	None	636	J	636	J	None	1470	J	1470	J	None	1310	J	1310	J	None
08A-0115-C1FS	118		118		None	18.6	J	18.6	J	ND or <QL	111		111		None	30.1		30.1		None	53		53		None
08A-0115-D1AS	93.1		93.1		None	81.8		81.8		None	172		172		None	587		587		None	291		291		None
08A-0115-D1BS	103		103		None	82.1		82.1		None	208		208		None	206		206		None	379		379		None
08A-0115-D1CS	374		374		None	69.1		69.1		None	442		442		None	498		498		None	701		701		None
08A-0115-D1DS	1290	J	1290	J	None	201	J	201	J	None	3190	J	3190	J	None	6210	J	6210	J	None	6890	J	6890	J	None
08A-0115-D1ES	4020	J	4020	J	None	435	J	435	J	None	9920	J	9920	J	None	24200	J	24200	J	None	21200	J	21200	J	None
08A-0118-C1BS	14.5	J	14.5	J	ND or <QL	0.464	J	0.464	J	ND or <QL	23.8		23.8		None	2.23		2.23		None	16.5		16.5		None
08A-0118-C1BT	24.6		24.6		None	2.7	J	2.7	J	ND or <QL	28.6		28.6		None	1.33	J	1.33	J	ND or <QL	17.4		17.4		None

Appendix T
Summary of Adjusted PCDD/PCDF data

Analyte CAS RN Units Method Sample ID	Total HxCDF HxCDF ng/kg					Total PeCDD PeCDD ng/kg					Total PeCDF PeCDF ng/kg					Total TCDD TCDD ng/kg					Total TCDF TCDF ng/kg				
	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†	Original		Adjusted		Adjustment†
	Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual		Result	Qual	Result	Qual	
08A-0118-C5AS	19.8		19.8		None	1.48	J	1.48	J	ND or <QL	15.7	J	15.7	J	ND or <QL	< 0.0806	U	< 0.0806	U	ND or <QL	5.87		5.87		None
08A-0118-C5CS	< 0.0501	U	< 0.0501	U	ND or <QL	< 0.128	U	< 0.128	U	ND or <QL	< 0.0871	U	< 0.0871	U	ND or <QL	< 0.108	U	< 0.108	U	ND or <QL	< 0.146	U	< 0.146	U	ND or <QL
08A-1070-C2AS	121		121		None	2.16	J	2.16	J	ND or <QL	270		270		None	30.8		30.8		None	102		102		None

Notes:
ng/kg = nanograms per kilogram
J = The analyte was positively identified; the associated numerical value is the approximate concentration of the analyte in the sample
UJ = The analyte was not detected above the reported sample quantitation limit however the reported quantitation limit is approximate and may or may not represent the actual limit of quantitation necessary to accurately and precisely measure the analyte in the sample
U = The analyte was analyzed for, but was not detected above the reported sample quantitation limit
F = The result is faulty due to problems outside the realm of typical validation rules/flags. This qualifier has been affixed to the result due to application of a correction factor (CSC 2011)
† = Adjustment factors reported here are back-calculated after the application of significant figures, factors applied are those presented in CSC Environmental Solutions, 2011.